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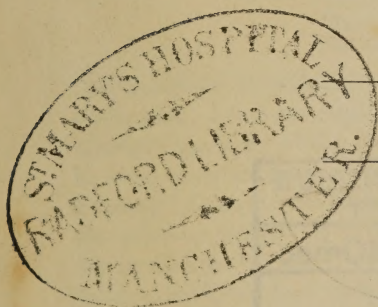
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Quarterly Retrospect.

January, 1861.

"If this city, or the suburbs of the same, do afford any young gentleman, of the first, second, or third head, more or less, whose friends are but lately deceased, and whose lands are but now come into his hands, that (to be as exactly qualified as the best of our ordinary gallants are) is affected to entertain the most gentleman-like use of tobacco; as first, to give it the most exquisite perfume; then to know all the delicate sweet forms for the assumption of it; as also the rare corollary and practice of the Cuban ebolition, euripus, and whiff; which he shall receive or take in here at London, and evaporate at Uxbridge, or farther, if it please him. If there be any such generous spirit, that is truly enamoured of these good faculties: may it please him, but (by a note of his hand) to specify the place or ordinary where he uses to eat and lie; and most sweet attendance, with tobacco and pipes of the best sort shall be ministered: *Stet, quæso, candide Lector.*"*

We commend this advertisement of MASTER SHIFT, otherwise SIGNIOR WHIFF, to the SHIFTS of our own day in the present stage of the so-called "GREAT TOBACCO CONTROVERSY." Why should the æsthetics of tobacco-smoking be suffered to lie dormant? Their cultivation would afford a grand field for a man of genius. The pipe, that

"Little tube of mighty pow'r,
Charmer of an idle hour,
Object of our warm desire,
Lip of wax and eye of fire,"

must assuredly be recognised as one of the most cherished institutions of civilization; but is it not painful to reflect that, notwithstanding all the boasted superiority of the Occident, we fall infinitely below the Orient in everything that relates to the elegance and refinement of tobacco-smoking? Compare the Eastern gentleman comfortably squatted amidst the piled-up pillows of a divan, and inhaling the aromatic fumes of the irresistible "timbac," or latakia, and a host of fragrant congeners, from a noble six-foot chibouque, or from the elegant and musical water-pipe, with the Western gentleman puffing the narcotic and irritating vapours of "shag," or "Cavendish," or "bird's-eye," from three inches of "clay," or a short-stemmed "meerschaum," blackened, it may be, with months of usage. Faugh! well may the fastidious exclaim, "The nasty, filthy, disgusting pipe!"

* *Every Man out of his Humour.* Act iii. sc. 3.

The ingenious and learned Democritus Junior appears to have had a vague idea that the evils of tobacco lay chiefly in the manner in which the herb was used. "Tobacco," he writes, "divine, rare, super-excellent tobacco, which goes far beyond all those panaceas, portable gold and philosopher's stones,—a sovereign remedy to all diseases. A good vomit, I confess; a virtuous herb, if it be well qualified, opportunely taken, and medicinally used; but as it is commonly abused by most men, which take it as tinkers do ale, 'tis a plague, a mischief, a violent purge of goods, lands, health—hellish, devilish, and damned tobacco, the ruin and overthrow of body and soul,"*

That we take tobacco as tinkers take ale, may be a somewhat strong expression as sentiment now goes, but it is one very much to the point. If we must have tobacco-smoking,—if it is to rank among the most prominent of civilized institutions, why should not the habit be made amenable to those refinements which are to be found in wine-bibbing and cookery? History shows us that coarse feeding, gluttony, and drunkenness have declined in proportion as the arts of preparing food, and the habits of drinking wine have advanced in refinement. Let us apply the lesson to tobacco-smoking. Why should we not have a perfect art and science of smoking, and professors thereof, who, like Shift, would instruct us in what manner to give the herb its "most exquisite perfumes"? The offensiveness of the habit is a question of æsthetics, and not of ethics; of FASHION (that potent abstraction in civilized life), and not of LAW. Justice Overdo has long called aloud in the market-place,—“Stay, young man, and despise not the wisdom of these few hairs that are grown grey in care of thee. Thirst not after that frothy liquor, ale: for who knows when he openeth the stopper, what may be in the bottle? Hath not a snail, a spider, yea, a neuft been found there? Thirst not after it, youth, thirst not after it. Neither do thou lust after that tawny weed tobacco, whose complexion is like the Indian's that vends it. And who can tell, if before the gathering and making up thereof, the Alligarta hath not corrupted it; the creeping venom of which subtle serpent, as some late writers affirm, neither cutting the perilous plant, nor the drying of it, nor the lighting or burning, can any way persway or assuage? Hence it is that the lungs of the tobacconist are rotted, the liver spotted, the brains smoked like the backside of the pigwoman's booth here, and the whole body within, black as her pan you saw e'en now without. . . . And what speak I of the diseases of the body, children of the Fair? Hark, O you sons and daughters of Smithfield! and hear what malady it

* *Anatomy of Melancholy*. Part ii. sect. 4; Mem. 2, sub-sect. 2.

doth the mind: it causes swearing, it causeth imagining, it causes snuffling and snarling, and now and then a hurt.”*

“Are not these brave words?” exclaimed one of Justice Overdo’s auditors. Brave words truly, which have long become stereotyped with those philanthropists who rank tobacco-smoking among the great evils which infest social life. But hitherto, alas! the lot that befall Justice Overdo’s exertion has befallen the well-intentioned efforts of all subsequent social reformers who have meddled hostilely with tobacco; that is to say, the efforts have been of non-effect. The reason of this is not far to seek. We can only combat error in so far as we have truth on our side. Now this simple truism has been constantly overlooked by the opponents of tobacco-smoking. They have been, and are, far too much addicted to depict the habit as one manifestly most influential in deteriorating both the physical and mental powers. Arguing chiefly from the known potent and often most noxious effects of the herb, when used medicinally, and of its essential constituents when used experimentally, it has been too readily concluded that its use by smoking cannot, under any circumstances, be had recourse to habitually without evil effects. The direct evidence in favour of this conclusion is of a most restricted kind, and is confined mainly to the influence of smoking among young persons.

This question, however, must rest upon its own merits; so also must that of the abuse of tobacco. That the use of tobacco by the young is an evil to be earnestly contended against we freely admit; that an excessive use of the herb is an evil under any circumstances is undoubted; but on the general question of the use of tobacco we would quote the opinion of Dr. Morel, the learned author of the *Traité des Dégénérescences, Physiques, Intellectuelles, et Morales, de l’Espèce Humaine, et des Causes qui produisent ces Variétés Maladives*. Dr. Morel’s opinion is of peculiar value upon this question from his researches having been specially devoted to its solution—the question being one of the earliest he had to deal with in the great work to which we have referred. He writes:—

“I do not propose to attack the usage of this substance, and this for several motives. Firstly, it is far from being demonstrated that the habit of smoking or taking snuff, in proportions tolerably well understood, is in any way noxious to health. Secondly, if we examine the question with particular reference to moral hygiene, we are convinced that the most severe and efficacious legislation that could be imagined against a habit that has passed into an irresistible want, would not be without danger. The part of medicine,

* *Bartholomew Fair*. Act ii. sc. 6.

under these circumstances, is to indicate, on the one hand, the dangers of abuse, and, on the other, the not less great inconveniences which would arise if this substance of doubtful harm were to be replaced by another, the eminently deteriorating influence of which cannot be denied by any one. I allude to opium in these last words, and my argument for the moment may be expressed in the almost trivial truism, that of two evils it is best to choose the least." (p. 171.)

But the question of the use of tobacco does not rest, as is commonly imagined, solely upon the influence of the herb on physical health. We cannot justly conceal from ourselves the great psychical benefits which are constantly arising from the habit of smoking. Watch the soothing effect of a pipe on the mind of the labourer in the intervals of his labour; mark how often the misery of domestic suffering, or the dread wretchedness of semi-starvation among our cottagers, are assuaged by the potent fumes. What! we hear some reader exclaim, parenthetically, a labourer waste money on tobacco when he has not wherewithal to feed himself with! Yes, dear reader, often and often have worn and wasted man *and woman* said to us, at a time when we, in our ignorance, also thought it a sinful waste to spend money upon the cherished herb, "Ah, sir! with the money that would buy but one or at the best two meals, I can eke out a week of half meals. Without the tobacco I should starve right out."

Brand quotes the following quaint old epigram:—

"All dainty meats I do defie,
Which feed men fat as swine;
He is a frugal man indeed
That on a leaf can dine.
He needs no napkin for his hands,
His fingers' ends to wipe,
That keeps his kitchen in a box,
And roast meat in a pipe."

Ask the soldier who fought in the trenches before Sebastopol, in the rain, deep mud, and slush of autumn, in the bitter cold of winter, and in the burning heat of summer, when the deep ditch glowed like an oven, what was the value of his pipe, particularly when his rations were scanty. Think you that gold would have bought it, or that he would have held up the better without it?

Beaumont sang, and our Crimean soldiers would sing with him:—

"The cold it doth heat,
Cooles them that do sweat,
And them that are fat maketh leane:
The hungry doth feed,
And, if there be need,
Spent spirits restoreth again."

Ask our sailors now, in these winter days, how they value their

tobacco. Ask many of our literary, and scientific, and mercantile men, whose brains are fretted with labour, whether the pipe is not to them a magic wand. But what need to multiply instances? The habit of smoking carries good as well as evil in its train; and if we would eliminate the evil, we can only hope to effect this by confining ourselves solely to that object, and not by confounding the evil and the good together, and indiscriminately attacking both. The weakest point of tobacco-smoking is its ethical, not sanitary aspect.

The *Daily Telegraph*, in a most able article, has dealt admirably with the latest phase of the tobacco controversy, and has set forth most clearly the chief physical evils anent smoking with which we have to contend:—

"The great Tobacco Controversy is by no means settled. Mr. Solly, Sir Benjamin Brodie, and the sages of the Anti-Tobacco Association have had their say; yet a great deal remains to be argued and explained *pro* and *con*. Those of our readers who are fond of polemics may remember that, after a well-known theologian of the seventeenth century had published his *Last Words of Mr. Baxter*, he bethought himself that he had not quite settled all matters spiritual to his own satisfaction, and so came before the public with a ponderous pamphlet, entitled, *More Last Words of Mr. Baxter*. Thus, with this precedent for an apology, we may be excused for again calling attention to the vexed question of the innocuous or baneful effects of tobacco-smoking. Our own opinions on the subject should be, by this time, pretty well known. We hold that in adults the capacity, or the want of capacity, for inhaling or emitting the fumes of tobacco must be considered as a matter of constitution and temperament. If a man's nerves or stomach cannot stand or are injured by the use of tobacco, he must either be a fatuous idiot or a constructive suicide if he ever attempts to put a pipe or a cigar between his lips. We hold that in any case smoking in adolescents should be discouraged until a young man be well grown, until his muscular system be fully developed, and his habits of life definitively formed. We hold most decidedly that the practice under any circumstances among growing boys and lads should be sternly inhibited by parents, by employers, and by those entrusted with the education of youth; and, finally, we hold that all smoking to excess is most injurious and most dangerous, and in no case more so than with persons whose pursuits are of a sedentary nature. While, therefore, we refuse to join in any crusade which has for its object the legislative repression of smoking, or the denunciation, either from pulpit or platform, of taking tobacco as a practice akin to the deadliest of the seven deadly sins, we are desirous of assuring all those who wish to abate the indubitable evils to which immoderate and premature smoking gives rise, that they have our heartiest sympathy, and that we shall continue to exert our influence to mitigate the reckless indulgence in a questionable luxury, to which so many of our youths, particularly of the middle and upper classes, are addicted.

"It is curious to note the new phase into which, within the last few months, the tobacco question has entered. Leaving Germany out of the question—which, from the Elbe to the Danube, is one vast expanse of cloud-land—the neighbouring country of France is about the last in Europe from which we should expect to hear a word alleged against tobacco. She is the favoured land of cheap and nasty cigars, of snuffy old gentlemen, of *lorettes* who puff *cigarettes*, and of short pipes *culottes* with the strongest *caporal* reeking with essential oil. The immense extent to which smoking is carried there may be

judged of by the facts, that the cheapest cigar in Paris costs a halfpenny, and the cheapest cigar in London a penny; and that, while nothing is more common than to see the poorest classes in France with a cigar in their mouths, it is of exceedingly rare occurrence to see either an English labourer or soldier smoking even the humblest penny *Pickwick* in the streets by day. It is true, the private smokes in his barrack-yard, and the workman enjoys his pipe as he goes to or returns from his work; but the French artisan and the French soldier are always smoking. Abroad they puff at the coarse and rank *sou* cigar. At home they stupefy themselves with the narcotic and oleaginous pipe. So apparent has this constant steeping of the faculties become to the military authorities, that the permission to indulge the habit in barracks has been in a considerable degree abrogated; but still the French warrior consumes tobacco to an extent which would amaze the most inveterate subaltern of Aldershot and the Curragh. Some very interesting statistics have, moreover, lately been published, showing, so far as figures can show, that the youths at the Imperial schools and colleges addicted to the practice are intellectually inferior to those who repudiate it;* and the Minister of Public Instruction, alarmed at the prospect of the cigar-loving pupils of the Polytechnic and the Lyceums turning out dunces, has positively prohibited the use of tobacco in the educational institutions of the State. As Paris alone contains 29,000 pupils, it may be seen to how large a population this edict applies. Public instruction in England is not so widely extended. The masters of schools such as Eton and Harrow have generally been in the habit of putting down smoking among their boys by a smart application of the birch to those detected in indulgence in this illicit gratification. In private schools, the authority of the master is usually found sufficient to prevent the evil; and no such very serious harm accrues from a few big boys occasionally stealing out on a half-holiday to enjoy a surreptitious cigar. But, although the great body of schoolboys are exempt from any of the more serious evils of excessive smoking, there are thousands of young men, either in *statu pupillari* or just entering upon life, to whom an overdue propensity to it is in the highest degree deleterious. The real victims to tobacco in England are not little boys at school, but young subalterns, students, undergraduates, clerks, assistants, and pupils to engineers and architects. These are the young sensualists whose perpetual pipe or cigar renders them pale, sickly, and haggard, stunts their growth, and turns lads who should be ruddy, lusty, and active, into decrepit striplings, whose emaciated forms and feeble gait give them equally the appearance of suffering either under confirmed ague or incipient *delirium tremens*.

"While it is expedient—and, indeed, in the highest degree necessary—to deprecate the practice by boys and growing youths, we cannot for one moment give our adhesion to any project for putting it down by the strong arm of the law. The last remnant of the 'Blue Laws' of Massachusetts was to prohibit, under penalties, all public smoking. It became eventually impossible to enforce the penalties, and we believe that the prohibition itself has by this time fallen into desuetude. Some well-meaning but mistaken people in Glasgow are striving to introduce a similar foolish and tyrannical ordinance into the second capital of Scotland, and have memorialized the municipal authorities to hamper their new police laws with a clause rendering smoking in the streets a punish-

* We only know these statistics through the medium of one of the daily journals; but, so far as they could be judged of under these circumstances, they are far from satisfactory. The boys who smoked, it was stated, formed the least promising material in the schools, and it was inferred that their intellectual inferiority arose from the vicious habit indulged in by them. But might it not have been that the habit was adopted only by the most stupid and idle boys? that the smoking was the index of intellectual inferiority, not the cause?—ED. PS. J.

able offence. The thing, clearly, cannot be done. It would be an unjustifiable interference with the liberty of the subject, and, while it might preserve a few sensitive noses from the contagion of tobacco, the domestic comfort and cleanliness of Glasgow would be in the long run the sufferers by so silly an edict; for the smokers, driven from the streets, would be eternally puffing in the interior of the houses, and every parlour, dining-room, and bedroom of the commercial metropolis of Scotland would be rendered pestiferous by the fumes of Cavendish and 'honey-dew.' The experiment of forbidding the habit has been tried in Berlin, and notably in St. Petersburg, where, after ten years' endurance, it was found to have produced the pleasurable result of making the majority of the Russian ladies confirmed smokers! 'Glasgie bodies' had better bear with the ills they have than fly to others that they know not of. An anti-smoking law in Great Britain would be as anomalous, and prove in the long run as inoperative, as a Maine liquor law; but our strong disinclination to see any undue interference with a custom which intimately affects the personal liberty of the community in no wise alters our opinion as to its noxious effects on youths, and the necessity of discouraging the practice by all legitimate means." (*Daily Telegraph*, Nov. 20, 1860.)

It is reasonable to presume that when the Glasgow anti-tobacconists proposed to legislate for tobacco-smoking as for factory chimney-smoking, they were acting under a paroxysm of social reform enthusiasm, induced by the meeting of the SOCIAL SCIENCE CONGRESS in their city. The annual gathering of this Congress has now become an established and the most notable event of the terennial quarter of the year. The last meeting, held in Glasgow, was in no wise less interesting than its predecessors. We do not propose, however, to touch upon more than one portion of the proceedings, the address, to wit, of SIR J. K. SHUTTLEWORTH, on the *Correlation of the Moral and Physical Forces*. This address contained a masterly and most philosophical outline of the great principles of social science, and these were treated with a comprehensiveness and novelty peculiar to Sir James's disquisitions. We quote an abstract of certain portions of the address:—

"Sir James began by referring to the address which he delivered last year at the meeting of the Association at Bradford, in which he drew attention to the traces of a similarity of laws in the material history of the world, and in the growth of modern civilization. The stability of nature and of society were alike shown to be consistent with perpetual change. The change was for the most part so gradual as to cause no disturbance to order. In like manner the evolution of a primeval design through long ages of development in the world of mixed moral and material forces, was manifest in the history of civilization. The co-ordination of moral and material forces in the development of civilization was no other thing than the reign of the supreme intelligence over the mixed moral and physical constitution of man. It was to this correlation of moral and physical forces in questions of social science, that he ventured to solicit attention. The marvellous conjunction of the material with the purely vital had a close analogy to that commixture of the moral and physical in man and in society the laws of which it was the peculiar function of this Association to explore. For example, pure economical science was concerned only with the accumulation and distribution of wealth. Yet such was the co-ordination of moral and physical forces in the constitution of society, that even economic

logic, by severely excluding moral considerations, encountered the operation of higher laws than those regulating the accumulation of wealth—laws which demonstrate either that the sources of wealth lie deep in the moral nature of man, or that the result, wealth, may be purchased at a price ruinous to individual happiness and to the well-being of a State, because inconsistent with moral laws. Sir James proceeded to give an illustration of both of these interferences. His first illustration referred to cheap labour, in which he showed that while the cheapness of slave-labour was diminished by various moral considerations, the labour of freemen became more valuable in proportion to their willing acquiescence in the terms of the contract, to their intelligence and morality, and to their dexterity and inventive skill. The development of manufacturing industry had been as much promoted by the skill and inventive faculty of the free workman as by the master. The steam-engine was improved—almost invented—by a working instrument maker in this city—the spinning jenny was the creation of a handloom weaver—the ‘water-frame’ and the circular carding machine, of a barber—the ‘mule,’ of another handloom weaver—the ‘self-acting mule,’ of Richard Roberts, who had been a working mechanic—the modern railway and locomotive, of a colliery mechanic. English calico printing owed its power of competing with the French and Swiss chiefly to the discoveries of John Mercer, originally a handloom weaver, and then a self-taught chymist. These were the results of freedom, not of slavery; yet without some of these inventions probably England would have been unable to compete with Napoleon I., and Europe would, for the last fifty years, possibly, have been groaning under one vast military despotism of the dynasty which sprang from the French Revolution, to destroy feudalism and erect itself on its ruins. Here, then, a higher law, lying deep in the moral constitution of man, encountered that which was once the law, governing the relations of master and slave. Labour was not cheap in proportion as men were profligate, and willing to sell themselves, their wives, and children for the means of leading sensual lives. But labour was cheap in proportion to the intelligent exertion, the inventive skill, the enlightened co-operation, the forethought, morality, and sense of religious obligation among our freed men. Passing next to the second consideration—namely, that wealth might be purchased at too great a price, ruinous to the individual happiness or to the well-being of a State, because inconsistent with moral laws—Sir James adduced the slave trade and the opium trade as affording examples of the reaction of an immoral traffic, by introducing an element of moral and social weakness into the State. Under this head he also referred to our own laws with respect to the sale of beer and spirituous liquors, which we permitted to be used in excesses destructive to health, property, and life, brutalizing and degrading our population—excesses which might, however, be diminished by a vigorous police and a stringent administration of the law under the Licensed Victuallers’ Acts, and extirpated by religious education. Universally the proposition was true, that the profits of a trade or the sum of a revenue which depended on the extent of any degrading social habit among the people, were inconsistent with their happiness and with national well-being, and also with their economic prosperity, because they destroyed the very sources of wealth—the health, energy, intelligence, and virtuous constancy of a nation. In the algebra of the science of wealth, the relations of capital and labour were considered solely as a question of supply and demand. The moral element which led to combination was kept out of sight. The science simply denounced the interference of strikes. But they were a social war, in which men were contented to subsist on a fourth part of their ordinary wages for months. They disturbed the supply of labour, and might disperse it. The influence of affable manners, attention to the comforts and well-being of workmen, perfect justice in all transactions, or still more of generosity, in attaching men to the interests of their masters, were, among many other moral forces,

interfering with those which are purely economic. In like manner, experience operated so powerfully that the sons of men who destroyed newly-invented machines would now eagerly protect any mechanical improvement. The sense of social and personal right was growing so fast that the picketing of mills was at an end; personal intimidation was assuming milder forms, though it still resorted to the flagitious weapons of slander and libel. The power even of the most skilfully organized combinations of capital was met by the combinations of labour. But trades' unions could not be permitted to usurp the direction of capital. That would be as fatal to commerce as an eruption of the central fires, or the destruction of credit by the occupation of London by a foreign force. Nor could capital in a free country be permitted to dominate by prolonging the ignorance and sensuality of the workmen. Neither the domination of capital nor of the trades' unions was compatible with social freedom, or with commercial prosperity. But these forms of usurpation could only be averted by such intelligence and higher morality as might enable the parties interested to adjust with patience and good will the relations of capital and labour in their growing but ill-defined partnership. By experience and education only could the workmen be induced to leave undisturbed the control of commercial enterprises in the hands of the capitalists. By a conviction of the price which must be paid for the cordial co-operation of the workmen, and for the sense of security which was essential to trade, would the master ultimately so adjust the distribution of the profits of trade as to make the interests of the working man his own. Sir James next referred at some length to the marked influence of civil and religious freedom on the growth of our economic prosperity, and, in reply to those economists who questioned the interest we had in applying the national revenues so freely as was now done to the education of the people, he urged that it was impossible to diminish effectually pauperism and crime without employing moral as well as economical or repressive forces for their extirpation. Improved sanitary agencies did not expend their force simply in the prolongation of the mean duration of life, nor in the increase of health and vigour in the population—they reached even the moral nature of man. They were a part of civilization which rendered him less subject to debasing instincts, prepared him for the culture of his intelligence, and elevated him from brutish habits towards the transforming influence of religion. It would, however, be a fatal error to rely on sanitary agencies alone; and he proceeded to consider next the influence of education as a great moral force on national polity, and how it ought to be organized so as to be consistent with civil and religious liberty. The first question which next arose was, whether education ought, in all cases, to be regarded as a sacred function of the parent, with which none were to interfere? Individual liberty was so important an element of social freedom that we who, as a nation, preferred, before every other benefit of civilization, to be free, had the utmost jealousy of the invasion of that power of separate action which, especially when it affected liberty of thought or speech, or obedience to conscience, became with us a passion. To protect the child from parental neglect had with us, therefore, been subordinated to the personal freedom of the parent. He believed that the experience of the workmen in those trades in which the hours of labour of women and children had been limited, and the children from the age of eight to that of thirteen, had been required to be sent to school, had not only inspired the operatives with a conviction of the salutary operation of the law, but had even led the large masses of people working in them to regard, in a greater degree than heretofore, the legislative and the executive Government as a protective power, exercising a wise and beneficent vigilance over their well-being. The extension of the half-time system, or of some equivalent arrangement, to all associated labour, with such modifications as might be found indispensable to meet the peculiarities of particular employments, appeared to him the first expedient by

which our great manufacturing establishments could be adequately supplied with the labour of children, consistently with that which was the most urgent social, commercial, and political want—the creation of a literate, moral, and religious working class. Apart from the proper questions which are involved in bringing all the moral forces, and among them the highest—that of religious faith—to bear on the education of our youth, the Government had wisely determined to preserve the religious constitution of our schools."

Sir James then proceeded to detail the state and requirements of education in the kingdom, and he then concluded thus:—"The sum of intellect and of religion in society were the two greatest forces by which nations might be changed. He had shown how the moral forces were correlated to all others. The moral forces, correlated with new modes of action, constantly tended to penetrate the whole structure of society. When their transforming power was witnessed, as in the history of civilization, it might be believed that this transformation, though so general in men's ephemeral lives as almost to escape observation, was still in progress surely approaching in the ages of that time which inspiration described as the era when all the kingdoms of the world should become the kingdoms of the Lord and of His Christ. Meanwhile, they might with reverence seek, as this Association did, to understand these mixed forces, and to make ourselves their intelligent senators. Sir James concluded by saying that they were not the true friends either of the State or of the people who would teach the ignorant and sensual to grasp at power. No dominion could last which was not in harmony with those primeval moral forces which operated by religion and mind, by faith and knowledge, by intelligence and virtue, on the happiness of men and the strength of States. These were the forces which must rule. They had an irresistible power. They subordinated all the physical forces to do their work. They penetrated alike the influence of race and civilization, of traditional customs and ancient institutions; they transformed the most hostile combinations; they entered the conscience of the individual man, and made him a new being. In like manner could they enter the corpse-like structure of a death-stricken nation, and make it a regenerate people. For this we had the assurance of Christ—'Ye shall know the truth, and the truth shall make you free.' Sir James sat down amid loud cheers."

Upon certain practical suggestions contained in this address of Sir James, as well as in an address of the Hon. Arthur F. Kinnaird, on "Punishment and Reformation," delivered at the same meeting, the *Times* made the following instructive comments:—

"Sir J. K. Shuttleworth says many true and important things in his Glasgow paper. He says that the art of money-making is not the only art that a nation ought to cultivate, that if we give ourselves entirely to commercial science and aim at increasing the national capital anyhow, as if that were the only thing to be thought of, we shall find ourselves coming into collision with other laws relating to national prosperity, and especially the laws of morality,—that these two sets of laws must come to a compromise and understanding with each other. This is the doctrine of 'the correlation of moral and physical forces.' The sum total of our products might gain for a time by an unprincipled and grinding system of labour which used men as brute instruments, but it would ultimately lose by this brutalization of the mass. We should never have got a Watt, an Arkwright, a Roberts, a Mercer out of our operative class, with their inventions to multiply capital a hundredfold. Our revenue might gain by an excess of consumption of spirits, but the moral deterioration of the mass would result in a loss far greater than any such gain.

"All this is very true, and it gives us great pleasure to see gentlemen like

Sir J. K. Shuttleworth and Mr. Kinnaird looking after the morals of the country. We only wish we could see less of a rising disposition to invoke Parliamentary assistance to this cause. Philanthropists, moralists, and regenerators are subject to the same temptation that all others who have plans and schemes are. They like results. They want a good tabular show at the end of every five years, and they are right in wanting it; but they go further, and are so afraid of not getting it by ordinary means that they ask Parliament to help them. Both Sir J. K. Shuttleworth's and Mr. Kinnaird's papers tend to legislative interference in morals. We note this tendency in the Social Science papers on this class of subjects, because it is a tendency against the spirit of the age, and because if this is the new Social Science policy on these subjects, it ought to be understood to be such. Sir J. K. Shuttleworth would have the crime of drinking extirpated by 'religious education, a vigorous police, and a stringent enforcement of the Licensed Victuallers Act.' Mr. Kinnaird is for placing 'crowded tenements' under penal Acts, for introducing the Forbes Mackenzie Act into England, and for a new Act of Parliament for the observance of the Sabbath. This is very intelligible. When men have hobbies, be they ever such good ones, they are anxious about them. They look on all sides of them to see what chances they have upon the ordinary ground and left to their own working. Sir J. K. Shuttleworth's hobby is education—a most creditable one. He looks about him, then, to see what chance it stands when left to nature and the voluntary principle, and he does not think much of it. What are we to do with the 'apathetic districts?' What are we to do with the manufacturer's absorption of young hands and the parent's love of the child's earnings? He goes over some Acts of Parliament that have *not* passed, which were intended to rectify these evils. This does not raise his spirits, more especially as he thinks if they *had* passed they would not have effected their object. A 'permissive' rate would have been to little purpose; only a 'compulsory rate' would have had any effect, and a compulsory rate he does not expect to get. As a step in the interim he would like to have a million more of the public money annually, and this apparently he does expect. We cannot say we do. So, what with manufacturers and what with parents, what with 'apathetic districts,' and what with 'civic authorities who do not show zeal in the cause of education,' Sir J. K. Shuttleworth is no preacher of the voluntary principle in this cause. He does not actually say that he would like an Act of Parliament to compel all parents to send their children to school and keep them there up to a certain age, but he is offended by the irregularities of the present system. Reformation is Mr. Kinnaird's hobby, and here it is the same story over again. Mr. Kinnaird is evidently afraid that we shall not reform ourselves quick enough if we are left to ourselves. He goes at once to Act of Parliament.

"We do not want, then, to throw any damper upon the zeal of our educators, reformers, and regenerators, but we must make the observation that this is rather a new policy to start. Here is an incipient school for legislative interference in morals, which our Social Science meetings appear to have formed. The school is modest as yet, and does not demand anything astounding; it would only have our lodging houses inspected to see that men and women conducted themselves with decency, and have the observance of the Sunday enforced by Act of Parliament 'on the memorial of nine-tenths of the shopkeepers of a district or parish.' But its demands will rise in time. Whether this is right or wrong, it is certainly in the teeth of everything we have been taught for a long time. The modern maxims have all been against interference of this kind, against making people good by law, and this is now the acknowledged and reigning principle. We presume it would be the orthodox doctrine even at our Social Science meetings, but when persons have a great subject to which they devote themselves this subject forms an exception.

'You *must* legislate for education, you *must* legislate for reformation, you do not hear what dreadful things are going on in lodging houses; the law must step in here; if Act of Parliament does nothing else, it must at any rate compel decency of manners.' These gentlemen cannot learn the lesson that subjects and small subjects must mainly be left to their own resources, and must be content to struggle on as they can, and get what ground they can amid the competition of interests which surrounds us. Here is the cause of education, for example—a very good cause, doubtless, a very important cause; but why is education to expect to have everything its own way, and to have the ground all cleared for it, at the cost of any other interest that comes in the way? There are hosts of serious interests that conflict with it—interests of trade, urgent necessities of parents. All these have their rights and their places just as much as education has. Education, then, must be content to get on by its own natural claims, without being helped over the ground at every difficulty by the legislature; more especially as we observe that our Social Science friends are beginning to disagree as to what education is, and what it should be. Mr. Kinnaird thinks that the committee of Privy Council, under the advice, we believe, of Sir J. K. Shuttleworth, made a great mistake in the choice of its type of education, which was a great deal too sublime for the working classes, 'unfitting them for service, and the performance of their home duties.' He thinks this 'superficial' stuff, which inflates them with conceit, should be discarded, and that 'industrial arts' should be taught instead. 'Why should not every boy know enough of tailoring, of shoemaking, of carpentering to enable him when a man and the father of a family to make his children's shoes, though he may be a painter by trade; to make the easy chair for his wife, or even to mend his own coat?' Mr. Kinnaird has evidently not much respect for the doctrine of Adam Smith, and still less for the claims of the alphabet. It is simply impossible that school children should master the hornbook and learn tailoring and shoemaking at the same time; and if they could, it would be a sad look-out for the unfortunate wearers of these amateur articles. The principle of subdivision flies confounded before Mr. Kinnaird's plan, and, expelled as obsolete and rude from English ground, it must take refuge in Otaheite. The truth is, those gentlemen who take up great subjects are dissatisfied with all results whatever. First, we are all to be made learned and scientific by education, everybody was to know everything; then it is found that this is a mistake, and another type of education comes in fashion. Whatever type of education, however, our philanthropists may adopt, we would advise them to talk a little less glibly about legislative interference either for the cause of education, or reformation, or any other. They form to themselves the image of a good nation, rather like that of a good school under the best superintendence. They picture all the lower orders being under discipline, and obeying the advice of philanthropic societies backed by acts of Parliament, all inhabiting model lodging houses, all respectable by statute. Alas! a nation is a very rough sort of material, and its virtue, when we get it, is not manufactured by act of Parliament."—(*Times*, Oct. 1, 1860.)

Apropos of education and of Sir J. K. Shuttleworth's "apathetic districts," the following summary and estimate of the value of the last year's doings of the *Book-hawking Union* are of great interest:—

"Lord Brougham repeated at Glasgow his own familiar saying, 'that the schoolmaster is now abroad.' Education has long had a hierarchy of its own, but there is room also for an itinerant element, more or less analogous to the preaching friars of the thirteenth century. The 'Book-hawking' system is one of the many subsidiary agencies which have lately sprung up in aid of the

main movement, and seems to do a great deal of useful work in a very quiet and unambitious way. Its object is to supply cheap literature of a healthy kind to a class who would otherwise read nothing, or only the most pernicious trash. The marvel is that, instead of having been 'started by the present Bishop of Rochester, then Archdeacon Wigram, in 1851, this should not have been one of the earliest schemes of philanthropists and educationists.' The stationary and semi-barbarous state of our rural population is not much affected by National schools. Generation after generation grow up with no aspirations beyond the condition of a peasant, and no interests beyond their own village gossip. Religion alone has elevated their ideas, but religion, after all, is more concerned with the heart than with the head. It sometimes strikes one as inconceivable what a ploughboy, even if he has been taught to read and write, can find to think of—what castles he can build in the air, what mental relief he seeks from his daily drudgery. Most occupations, including those which are purely manual, contain in themselves some elements of education, but they cannot satisfy the craving, where it exists, for a knowledge of life. This made Rasselas pine in the Happy Valley, and this, we may be sure, is no strange feeling to those who are virtually 'bound to the soil.' An abundant variety of experiences is ministered to the upper and middle classes by society and locomotion, but to the poor man there is but one avenue of approach to the outer world, and this avenue is reading. Books are to him not the symbols of intellectual task-work, but the means of refreshment, and the instruments of moral emancipation. If he reads at all, he reads in the first instance for amusement, and to gratify a legitimate curiosity. His ordinary work being mechanical, a little exercise of the mind or fancy comes as a luxury. Nor is it necessary that he should himself be 'a scholar' to enjoy this treat. 'The habit of gathering round the fire of a winter's evening to hear one of the children read out' enables many to profit by the education of one.

"The rapid progress of book-hawking almost justifies the hope that it is 'one of the new threads introduced into the old pattern of agricultural life.' In nine years it has developed 'more than sixty local associations,' and is still spreading. It is organized on a system by which a central union assists without tyrannizing over the efforts of local societies, supplying information and facilitating the collection of statistics. Of these the two most important heads are the comparative demand for books in the different classes of society. 'The largest amounts of total sales in any one district for the twelve months are:—Sussex, east, 680*l.* 13*s.* 4*d.*; Dorsetshire, 400*l.*; Hants, south, 283*l.* 17*s.* 2*d.*; Derbyshire, 349*l.* 18*s.* 6*d.*; Cheshire, 364*l.* 12*s.* 7*d.*; Durham, east, 256*l.* 2*s.* 9*d.* Some of the largest average weekly sales by one hawker are—Dorsetshire, 8*l.*; Sussex, 6*l.* 15*s.*; Durham, east, 6*l.*; Hants, north, 5*l.* 5*s.* The total amount of orders received at the central dépôt (8, Paternoster-row) for the six months ending March 31, is 2,800*l.*, not including the publications of the Christian Knowledge and Religious Tract Societies, which are supplied direct from the repositories of those bodies. The average sale per annum of each society is calculated at 230*l.* Multiplying this sum by the whole number of societies, it would appear that literature to the amount of 12,000*l.* a year is being circulated by this agency in England and Wales.' It further appears that 'the great bulk of the customers belong to the classes of labourers and servants, who would never think of ordering a book at a bookseller's,' and this fact is borne out by the great preponderance of low-priced books among those purchased. This is so far satisfactory, for every one must see that the quantity of books sold is of less importance than that they should 'go to the right quarter.' 12,000*l.* a year is but a drop in the ocean of bookselling transactions, but the creation of a taste for reading in a new class is worth a great deal.

"There are two or three features in the operation of this unpretending movement which deserve notice. The object of the Association is the sale,

and not the gratuitous distribution of books. In these matters the difference between charity and fair trade is fundamental. The recipient of a tract knows that the donor has some object in giving it, and, though that object be his own good, his feelings slightly rebel against it, and the more so if it be written in an affected style which he knows to be a clumsy attempt to imitate the peculiarities of his own way of thinking and speaking. 'Tracts which are given away are not sure to be read,' and if read they will not have the relish of that which the labourer has selected for himself and bought with his own savings. 'The books sold by the book-hawkers are the exact measure of the reading appetite of the people.' It follows as a corollary, that the selection, however carefully made, cannot be too miscellaneous. We are glad, therefore, to hear that 'the lists are copious, and present a wide variety to the choice.' It is not that the cottagers themselves are really capable of exercising much discrimination; but the protective system by which some busy clerical board docks and expurgates English literature till a residuum is left conformable to their notions of safety cramps the action of many a book-club intended to be popular. Among the new ideas which 'the school-master' has introduced is the pretty general belief that there are more lawful things in heaven and earth than would pass the censorship of a mixed committee of Puritans and Anglicans. 'Some clergymen object to all publications of the Society for Promoting Christian Knowledge; others to all those of the Religious Tract Society.' These jealousies are much less common to the religious laity, many of whom would admit that for this purpose 'no books are good but such as have life and nature in them, and are capable of taking hold of the imagination and calling up the intellect.' But the fact is that at present the religious books are most in demand. We are even told that among the colliers of Durham 'Butler's Analogy' is largely sold; while, on the other hand, we hear that 'the book-hawkers are continually asked for books which cannot be named.' This was found to be the case when book-stalls were first established at railway stations. But, 'in proportion as the book-hawker beats out of the field the old itinerant pedlar, the circulation of such books may be checked.' The sneers that are sure to be provoked by any scheme of 'world-bettering' are powerless against an attempt to supply a real and spontaneous demand. The sufficient reason for persevering in it is that it is answering its purpose without trespassing on ground already occupied. While the great educational parties are settling the plan of their crusade against ignorance, and preparing to annex what Sir J. K. Shuttleworth calls the 'apathetic parishes,' they will do wisely to disdain no means of weakening the enemy by a less regular method of warfare."—(*Times*, Oct. 3, 1860.)

The recent revivification in the columns of the *Times* of the question of labourers' cottages serves also aptly to illustrate several of Sir J. K. Shuttleworth's remarks, and is of considerable importance. It would seem to be a natural law that human efforts must flag, must fall into a humdrum, routine condition, be their object even of the best, if they are not roused from time to time into additional activity. It might have been thought that after twenty years' strenuous labours on the part of sanitary reformers, after twenty years of an almost incessant stream of books and papers, private and public, on the shortcomings of the dwellings of the working-classes, that there was little fear of the question being suffered to fall into a comparatively lifeless state in any district or town. The evil is one, however, that has been the growth

of ages, and the time of its rectification will, unfortunately, not be counted by a single, or, indeed, many scores of years. Much has been done, but more remains to be done; and it is but too certain that in many localities the question has been suffered to fall into the background, and that in others it has never been entertained but under the pressure of a pestilence. It is well, then, that our chief organ of public opinion has taken up the subject once more, and we trust that as time and occasion may serve, it will again and again bring its powerful influence to bear upon the possessors of cottage property. The following article is admirably conceived:—

“When a subject of general interest is once stirred in these columns one invariable result is, a full statement of all the difficulties that surround it. No doubt, a similar result in all ages has suggested the proverb that ‘in the multitude of counsellors there is wisdom’—at least caution and circumspection. It is evident that we shall soon know all that is to be avoided, and all that is impossible, in the matter of cottages for the labouring poor. Some of our correspondents give us valuable advice, and others advise the value of which consists in the fact that it is given and should not be taken. We would not advise any country gentleman anxious to improve either his people or his cottages to let ten acres on a perpetual lease to any speculative builder, and advance him 1000*l.* to build ten cottages, to pay him 30*l.* a-year. He will thereby not only part with the virtual ownership of his land and lose all control over its inhabitants, but raise a probable nuisance for ever on his property, which he may shortly have to purchase back from the builder at the cost of another 1000*l.*, if the builder is modest enough to be bought out at that sum. We would not advise a country gentleman to place his cottages absolutely under the management of his tenant farmers, though he will naturally consult their interests and comfort in letting them. We are not prepared to recommend that all the cottages in the country shall be placed under the county surveyor or a Board of Health, without whose annual certificate no cottage shall be let or inhabited. Indeed, we frankly own we are at a loss for any legislative remedy, and can only suppose that this is a matter in which public opinion is the best remedy. At all events, the bare discussion, the facts it elicits, and the contributions of experience and common sense, must do a world of good. There are many considerations that speak for themselves, and only require to be published. The clergy, the medical profession, the more enlightened farmers, and the resident gentry, are virtually officers of health. Surely it is sufficient, for example, to call their attention to the bare fact of the windows in many new cottages not being made to open, and there being absolutely no escape for the air in the room except the doorway at the head of the narrow stairs. It is a very important remark made by one of our correspondents, and applicable to every class of dwellings as well as cottages, that our improved architecture has itself done harm. An old cottage let in the wind at a thousand crevices—between the bedroom boards, at the windows, round the ill-fitting doors, and down the spacious chimney,—while the bedroom ran high up into the thatch. In the modern cottage the close and seasoned floor, the ceiling, and the well-fitted woodwork, answer the opposite purpose of shutting out the air and rendering the bedroom little more than a good sized vault.

“But, we repeat, we must consider this a case for public opinion, and gentlemen who think public opinion apt to be impertinent and intrusive, would do well to reflect whether they would prefer the annual visits of an official sur-

veyor, or perhaps an Act of Parliament out of hand, condemning every cottage on their estates, and compelling an expenditure of 10*l.* a-cottage, under official inspection. Nobody, except a very sublime Christian indeed, or a man on the look-out for a quarrel, likes to be told of his faults, but it may save him from disasters, or what he may care even more for,—public exposure. Thus it is a painful fact, that at the very moment when we are all priding ourselves on the sanitary improvement of the country, there is an unusual amount of fever and other epidemics. Something obstinately resists all our exertions, and seems to mock the boast of science that fever is a preventable evil. ‘Is it?’ says the fiend; and in the newly-built, slated, and whitewashed cottage, standing high and dry, amid roses and loaded apple-trees, far away from ditches, first one droops, then another, and typhus has possession. ‘There *must* be something amiss,’ says the youthful curate. No doubt there must be, but neither he nor any man can say what it is. In vain they sweep, and clean, and scour, and fumigate, and establish a cordon round the devoted dwelling, and use pounds of chlorine; there is another case fifty yards off, then another, and all down the road and up the lane there creeps the stealthy foe. The visitation does its work and dies out; but as it came, so it goes, shrouded in darkness, and leaves only a few weak surmises as to its cause, and the preventives. One thing only is evident,—that, while a dozen cottages were visited, the squire, the clergyman, and the farmers, with their families, notwithstanding frequent contact with the sick and dying, did not take the fever. So it is too true—‘There *must* be something amiss with the cottage.’ What is it? The question cannot be answered, though perhaps if any lady or gentleman, with the delicate senses of their class of life, were to try the experiment of occupying an ordinary cottage in a village almost any month of the year, they would be able to throw some light on the difficulty.

“From a pile of letters which our space will not allow us to insert, we must take one contribution to the most gloomy, and at present most incurable part of the question. There is that which is worse even than typhus, and which is a much more common result of bad and inadequate housing. When all ages and both sexes are huddled together as close as dogs in a kennel, decency becomes out of the question, and with decency the great safeguard against moral corruption. It is needless to assert what must be the results, because there the results are, and infinite scandals proclaim a deep-seated canker in the social condition of the labourer. It is nonsense to suppose, as we have heard it argued, that nature and habit are so wholly different in the case of the labourer and his growing sons and daughters, as compared with the higher classes, that the continual scenes of one common bedroom occupied by all sorts of people have no effect on the hard rural mind. What was to be expected does happen continually, and, what is worse, is thought nothing of. As to the results, we have an important testimony in the following passage from the Report of last October 15, by the Chaplain of the Gaol at Berwick-upon-Tweed:—

“‘There still remains one most important improvement to be effected before we can expect domestic comfort and family ties to produce among the labouring and poorer classes their inestimable influences for good. I refer to the miserable condition of the dwellings of some of our poorer neighbours. It is almost impossible to bring up a family to virtue and piety while they are huddled together in one wretched and ill-ventilated room. Frequently, too, the head of the family finds himself so uncomfortable at home that he seeks for cleanliness and comfort in the publichouse. Some of the places inhabited by our fellow-creatures are so miserable that neither health nor decency can possibly be retained there. The only *remedy* which suggests itself for this our greatest national deficiency appears to be in *legislative powers being given to Boards of Health* to close any house or room which is found, upon proper medi-

cal and other inspection, to be unfit for human habitation. It is indeed high time that our hard-working fellow-countrymen should be defended from the wretchedness entailed upon them by living in rooms where any one who valued a good horse would not allow him to be stabled for a week.'

"Whether the Boards of Health would meet the case in rural villages is a point on which we may be permitted to express considerable doubt. At present what is chiefly required is to raise public opinion against the practice of stabling our human labourers worse than the animals they drive or tend. Of course, where there are many proprietors, and where an 'open parish' invites the crowd that can find neither work nor lodging elsewhere, it becomes no man's duty to build cottages, and the work will not be done. There is, however, one simple rule universally applicable. It is that everybody should see to the proper housing of the people whom he permanently employs. True, it costs money, and the money is not always at hand. We ventured the other day to set men against land, and we deprecated the idle vanity of enlarging a territory when there was nothing in the condition of the people to be proud of. By any standard that an English gentleman can be prepared to stand or fall by, it certainly is much better to spend 5000*l.* in fifty good cottages than to add a hundred acres to an estate already estimated by thousands. In most counties of England the fifty cottages will be quite as good an investment as the hundred acres, even without considering the moral results. But it is not necessary to build new cottages in every instance. Old cottages can be enlarged and repaired, and, as a correspondent observes, supplied with good drainage, for 4*l.* a-cottage, and casements that will open for another pound. A little money will go very far in the cause of humanity, good morals, and health." (*Times*, December 18th.)

The chief thing to be noticed in this thoughtful article is, that the writer most justly insists that "this is a matter in which the public opinion is the best remedy." Legislation may smooth, and, in fact has smoothed, over many difficulties, but it will not touch the core of these difficulties. The essential obstacle to be contended with is the insensitiveness of the cottage-landlord to the moral responsibility involved in the relation between himself and his tenant. In so far as this insensitiveness is due to ignorance, it is for the doctor to diminish or remove it; in so far as it is due to indifference, for the clergyman and all right-thinking men. We hope that the *Times* has struck a note, the vibrations of which will not merely be not allowed to cease, but which will be steadily increased in magnitude.

The *Times* also has recently given place to a subject, the importance of which, in respect to the physical and moral well-being of a people, cannot well be exaggerated. We shall content ourselves for the present with simply quoting the statements of the leading journal:—

"Every change of our variable climate brings some defect, moral or physical, into broad relief. A hard winter shows us houseless wretches dying in the streets, and sets us to build refuges for the destitute; a dry summer brings drought into our houses and pestilence into our cities, and sets us to mend our water-supplies and to drain our houses and our rivers; a wet summer makes us repair our roofs and drain our lands, and look to the Registrar-General's Return in districts much visited by agues. We pride ourselves upon being a practical people, and the characteristic of a practical people is

never to interfere with a nuisance until it has become unbearable, and never to set seriously to work upon a remedy until the evil has risen to a *maximum*. The interjectors of difficulties always prevail with us, until public opinion has arisen to the flood-mark, when they are, of course, swept away, and the remedy is then for the most part improvised in a considerable hurry and without much knowledge, and in a manner which almost always requires to be made workable by the aid of half-a-dozen Amendment Acts.

"Judging from the correspondence which has fallen upon us since we some days since reported a meeting presided over by the Earl of Romney, there is just now great excitement among our agricultural population concerning a question of which all the rest of the nation know actually nothing. Mr. Bailey Denton tells us that these agitating landowners and farmers represent more than twenty millions of acres of land, and the facts laid before us indicate that these lands produce at present more agues than corn-ricks, that a large portion cannot be drained, and that the drainage of the remainder must render still worse the condition of those which are so nearly hopeless. The 'general reader,' however, glances at all these facts and figures with a puzzled air, and asks the next person he meets what 'arterial drainage,' and 'out-falls,' and 'river drainage' mean, and what those incomprehensible and unreadable letters in the *Times* are really about. As we believe this to be a very important national matter, and as we know that the first difficulty with the English public is to get the general nature of a new subject understood, we will attempt to diffuse a loose idea of what is about to be pressed upon the Ministry and upon Parliament.

"If the surface of this island were exactly in the form of a plum-pudding, there would be no difficulty about draining it. We should have the watershed line where the bit of holly is stuck in, and the water would roll down equally on all sides, just as the brandy-sauce rolls down, until it finds its ultimate destination in the ocean or in the dish. But that, as every excursionist may have observed, is not precisely the case. We have mountains and hollows, we have broad rivers and little rills, we have streamlets that run northwards to fall into rivers that run southwards. We have in many places large districts so surrounded by uplands that they at some time must have been lakes, and would be now, but that their waters have forced a narrow channel through the higher lands, through which a stream now passes and drains off the bulk of the water. There are also broad plains, which are not much higher, or are even lower, than the embanked river which runs through them; and these plains, receiving the drainage of the neighbouring uplands, cannot drain into the river at the level at which it passes them, but might, if allowed, drain into it at its lower level, a few miles further down its stream. Now, all the districts thus situated are in wet seasons, and for the most part in ordinary seasons, in the condition of a well-saturated sponge. But why does not the foolish owner drain them? That is just what he asks to be allowed to do. How can he drain them? Water has an inconvenient habit of insisting upon flowing down hill, and the river that passes him is, perhaps, banked up to a higher level than his lands. True, the river also must have its fall, but to get to the spot where its level is lower than the spongy land, or perhaps even to get to the river at all, he must dig a drain several hundred yards, and all that intervening land belongs to some one else. By what means is he to get over his neighbour's land? He must not dig it *up* to his neighbour's land, and send the water to spread over his fields. Nor would it pay him to go to all this expense for his own small farm, and to drain all the district as well as his own farm, paying the cost out of his own pocket. He might just as fairly be expected to establish a private workhouse to keep the beggars from his gate. But, even if we suppose that he were content to buy the land, and to cut the drain, and to go right away to the river, he will find, when he gets there, that there is a milldam right across

it, which keeps the water back to a certain fixed level, driving back the new volume of water which he has brought to the river, and spreading it again over the country. The miller has a vested right in his water power, and there is no class with higher notions of the value of their vested rights. He will have to buy the mill, or to buy the water power by endowing the mill with a supply of steam power, or by making the mill compensation reservoirs. Somehow or other he must deal with the mill.

"Now, this, we take it is, very loosely and generally sketched out, the evil which the landowners and farmers and the sanitary reformers are now banded together to reform. They want to make the courses of our main rivers, the arteries of our water circulation, free in their direct course; they want to greatly modify the obstacles which dam up the current and throw back the waters, raising their levels in the upper country, and preventing the veins of our drainage system from flowing into them. The simile is very bad anatomy, but let it pass. They want, moreover, to get access to these rivers or streams, which are our natural drains, and for this purpose they want to carry their surplus water through the intervening lands which belong to other persons, frequently infants or persons of limited estates, who have no power to sell permission except under very expensive processes. They want to do all this at some practicable expense, and there is no other way of effecting this purpose but that which is now the principle of all modern legislation,—that of giving to a large majority power to bind a small minority, with, however, power of appeal by the minority to some public authority whose duty it should be to see that the power is not abused. It seems reasonable. The only difficulty is in working it out. To bring it to a successful issue will require knowledge, industry, and tact. The millers are a very potent interest, and they do not see their advantage in the matter; it will be a matter of considerable difficulty to provide that a man shall only be rated in proportion to the benefit he derives from the works. These, and many other obstacles not noticeable at a distant view, start up as we approach the subject. The importance of the object is, however, great enough to repay us the labour of conquering these obstacles. Want of drainage is synonymous with disease. Why is the Coast of Africa so deadly? On account of the stagnant marshes by the sea. Why is the interior so deadly? On account of the oozy soil by the side of the rivers. Why can we not land in Sicily without being struck down by fever? Again, the undrained marshes. All over the world it is the same. We see its influence intensified into death where a hot sun comes to force out the malaria; we see it mitigated into agues, rheumatisms, and fevers where a cold climate discourages the exhalations. But, although it varies in degree, the principle is the same, and, if this subject deserves the attention of the Government upon economical grounds, its claims are still greater on account of its immediate relation to the health and well-being of the population." (*Times*, Dec. 20.)

Before closing our retrospect, the subject of the plea of lunacy demands a brief notice at our hands. In a leading article on the execution of MULLINS, the Stepney Murderer, the *Times* made the following remarks:—

"It is satisfactory that for once the plea of insanity has not been set up on behalf of the prisoner. We have no means of knowing on what grounds the memorial of the Sheriffs of London in his favour was founded, unless it were his own sustained protestations of innocence. But this time we have heard nothing of 'maniacal impulses,' and the records of medical science have not been ransacked to prove that taking away the life of a miserly old woman, and subsequently making a 'plant' of the stolen goods on a neighbour's premises,

is one of the commonest indications of mental derangement. What makes this hypothesis so peculiarly formidable is not its absurdity, but its deceptive approximation to the truth. A homicidal intent is in itself something abnormal, and is hardly consistent with a sound state of mind; but the unsoundness which it implies is widely different from that which interferes with responsibility, and may well change indignation into pity. Unfortunately, this is only one of the ambiguities by which juries are mystified and public opinion bewildered in such cases. For instance, a medical witness is put into the witness-box for the defence precisely because he is known to entertain a scientific crotchet favourable to the prisoner. The jury are not aware of this, and, looking upon him as a tolerably fair representative of his profession, listen with respect to opinions which would make the College of Physicians stare. Another chance *in favorem vitæ* is afforded by the entire publicity of all trials. No sooner is the report in the hands of the public than all the ingenious people whose lives are spent on riddles and chess problems rack their brains for a possible solution consistent with the innocence of the accused. The inventive faculty is enlisted in his behalf, and the Home Secretary is expected to entertain any reasonable suggestion, come from what quarter it may. All this is very right, and does credit to our humanity. We merely point out the fact that no one now suffers the penalty of death till every interpretation of the circumstances has been exhausted in his favour. As in warfare the art of defence sometimes outstrips that of attack, so in the present administration of justice the advantage, to say the least, is with the accused. If the operation of the law is thus charitably uncertain, it is doubly necessary that it should act sternly and inexorably where guilt is clearly proved. The State is not like a despot who can afford to condone private wrongs, and we have no right to gratify our compassion for a man like Mullins at the expense of those whose lives literally depend on the prompt expiation of crimes like his." (*Times*, Nov. 22.)

These observations would not, perhaps, have demanded specific notice, had it not been that, after the trial of YOUNGMAN, the Walworth Murderer, the *Times* had expressed observations somewhat similar in character, and equally calculated, we hold, to add to the difficulties which beset the plea of lunacy in a criminal court. Writing of Youngman, the *Times* said:—

"In this case the prisoner's story was obviously impossible. As the Judge remarked, there could be no reason why he should inflict repeated wounds upon his mother, and ultimately kill her, after he had, as he said, wrenched the knife out of her hand. The far-fetched suggestion, therefore, of homicidal monomania in the mother would not account for the facts, even if there were the least fact to rest it upon. The 100*l.* insurance settles the question of insanity as to the son. But, still, this medical craze of 'homicidal monomania' has once more been brought into a court of criminal law, and we never allow this perilous shadow to pass unchallenged. So long, indeed, as it is only the doctors who are crazy, and the juries are sound, this 'homicidal monomania' theory is but a trap for murderers. But we do not want to catch such game at the cost of breeding it. Whenever we hear this stuff talked in our courts we feel bound to remind the mass of the population what the law of insanity, as it affects the punishment of crimes, really is. The question the law asks is precisely one which, in the case of Dr. Duncan's homicidal monomaniac, must be answered in the affirmative. It is:—'Had the prisoner any right idea of the quality of the act he was doing?' The old law as laid down was, that to protect a man from criminal responsibility there must be a total deprivation of memory and understanding. In those days none but absolute idiots were held

to be unaccountable for criminal acts. We have come down one step further, and there, in the interests of society, we must make a stand, if we would not make great wickedness the licence of the acts it prompts, and if we would not emancipate human passions from all control."

Both these articles indicate a singular confusion of ideas, not only on the plea, but the nature of insanity. When a writer speaks of "a homicidal intent being in itself something abnormal, and hardly consistent with a sound state of mind," one is rather alarmed at the laxity of phraseology. "*Man is born unto sin, as the sparks fly upwards,*" is the dictum of sacred writers on the *normal* state of man; consequently, to use the term abnormal in reference to a purely sinful action, is not even warranted by ethics, much less pathology. The plea of insanity is essentially based upon the existence of *diseased* mind—abnormal mind, properly so called. Again, a homicidal intent or act is not looked upon, either in law or forensic medicine, as a proof of diseased mind; the character of the act, or the circumstances accompanying the intent, may lead to a suspicion of diseased mind, but the proof or probability of the existence of this has to be derived, and invariably is derived, from other sources.

Turning now more particularly to the comments on the Walworth murderer, we would remark, that nothing transpired in the course of the judicial proceedings to render it probable that Youngman was insane, but, on the contrary, everything tended to prove that he had been guilty of a diabolical series of murders. Youngman asserted that his mother had been the murderer, and that he had killed her in self-defence. The counsel for the defence based his arguments upon this statement, attempting to show the probability of previous insanity in the mother. During the progress of the case, in cross-examination, he asked Dr. Duncan, a physician, and one of the witnesses for the *prosecution*, his opinion upon the existence of homicidal mania. Dr. Duncan answered the general question by a general answer (having no relation to Youngman whatever) admitting his belief in the existence of such a form of mania, and describing it briefly in such terms as were warranted by medical experience as well as by the decisions of our own and continental courts of justice.

Setting aside, however, these understood circumstances, the very gratuitous character of the observations in the *Times*, and their exceeding inconsistency with the actual occurrences which gave rise to the casual medical opinion upon homicidal mania during Youngman's trial it is worthy of remark, that the writer entirely ignores all experience, and even the decisions of our own courts of law, as well as of continental courts, respecting homicidal mania. He converts a simple question of *fact*, which our courts are well able to deal with when raised, into a

matter of *sentiment*. In this respect we regret to say other daily papers adopted a similar course. So long as the leading organs of public opinion will not, as occasion may rise, assure themselves of the actual position of medical knowledge and of legal action upon questions of insanity, so long will that unhappy vacillation of public opinion upon these questions continue. What could more contribute to foster the annoying scenes that we too frequently witness in court than opinions such as those we have just quoted? The juryman, so prompted, enters the box prepared to look upon any plea in which insanity is raised, as a mere medical prejudice, and not a question of fact, to be decided as such. The bar is without any sufficient check in the morally legitimate use of the plea: for so long as the people look upon the plea as a matter of opinion rather than fact, so long will the bar be enabled to reproduce in our courts those scenes of contending views, so detrimental to the interests of the medical profession. When the press will content itself to deal with the plea of insanity as a simple question of fact, and with the professional witnesses who have to testify for or against insanity, as with any other witness, it will exercise an immense and most beneficial influence, in guiding public opinion aright in this matter, and in restraining those unhappy exhibitions which, neither to the interest of the law or of medicine, have too frequently disgraced our courts.

Quarterly Retrospect.

April, 1861.

THE last Quarterly Return of the Registrar-General (February, 1861), containing summaries of the marriages registered in the third, and of the births and deaths in the fourth, quarter of 1860, contains also a brief account of the VITAL CREDIT AND DEBIT for that year. If we had had, without the aid of statistics, to form our notions of the healthiness or unhealthiness, and the prosperity or not of the kingdom in 1860, our conclusions would have been upon the whole somewhat gloomy. The general intemperateness of the seasons, the backwardness or imperfectness of several of the most important crops, the dearness of food, the disturbances in the labour market, and the sufferings in several localities arising from this source, altogether would have formed a sad and depressing picture, from which little consolation could have been obtained. When, however, we turn from the vague ideas formed from general observation to the precise data afforded by figures, the silver lining of the dark cloud is at once turned to the light.

The *births* of 683,430 children were registered in 1860, and the annual birth-rate was 3·418, being ·014 above the annual average. The daily births, taking one day with another throughout the year, were 1867. The *natural increase* of the population of England and Wales amounted to 260,930 souls, averaging 713 daily. If the natural increase in Scotland and Ireland was at the same rate, the population of the United Kingdom must have augmented at the rate of 1069 souls each day. The *deaths* were 422,500, and the annual rate of mortality 2113, or a little more than 21 in 1000, the average of the preceding ten years being 22. Thus one life in every 1000 was saved.

Notwithstanding, however, the favourable vital balance shown by these figures, this is far from being what it ought to be. There is still a large amount of life-waste. If, for example, the mortality of the whole of England and Wales, in the last quarter of 1860, had been at the rate only of that experienced in the healthiest districts, the deaths, instead of being 102,557, would have amounted solely to 79,283. Thus, it may be estimated that during the 92 days of the quarter, 23,274 persons “died unnatural deaths in the least unhealthy country in Europe.

“An excess of deaths,” writes the Registrar-General, in his Return for the

Second Quarter of 1860, "which is not decreed by inexorable fate, may very properly be termed 'unnatural,' though it is quite true that, only the conditions being different, it is nature that *killeth* as well as *giveth life*."

"It is a remarkable and interesting fact, that if 2,000,000 of acres on which the chief towns of England are situated, be distinguished from the remaining 34,000,000 that hold small towns, and country parishes, it is found that the rate of mortality on the former (2'305 per cent. per annum) was *below* the average. The average rates were respectively 3'346 and 2'028. Although the time may be distant when cities will be as healthful as rural districts, or the inferiority which our English poet ascribed to 'the town,' as the handiwork of man, become much less apparent in point of salubrity than it is at present, it cannot be questioned that large populations have even now advantages of a nature favourable to health which villages do not possess. The highest attainable health is probably to be sought in a happy combination of both states—*rus in urbe*. The words of an excellent popular writer may prove to be no dream, but a well-founded expectation; he believes that we shall ultimately obtain 'a complete interpenetration of city and country, a complete fusion of their different modes of life, and a combination of the advantages of both, such as no country in the world has ever seen.'* And it may be asked, whether it is forbidden by this last expression to accept as a perfect model even Nebuchadnezzar's Babylon, which the distinguished writer himself has extolled."

A curious and very instructive illustration of the influence of the less apparent or less heeded sanitary laws upon mortality is afforded by the report of the Registrar of Holy Trinity, Coventry. Nothing in the course of last year excited such painful interest and so great sympathy as the distress among the ribbon-weavers of that city. The gentleman referred to states that notwithstanding the unprecedented suffering which had prevailed there in consequence of the prostration of the ribbon-trade, the rate of mortality was extremely low, "there being only 67 deaths against 132 deaths in the corresponding quarter of last year; 98 in 1858, and 100 in 1857." Upon this the Registrar-General remarks: "The care of the mothers of Coventry has, it would seem, counteracted some of the effects of privation; so that neglect of their homes by mothers at work in the manufactories, is apparently more fatal than starvation." To this observation we may very fittingly append another from the first Quarterly Return for 1860. In commenting upon the ungenial nature of the season in the first quarter of the year, the Registrar-General remarks:—

"It is evident that the severity of the season must have been felt all over the kingdom; yet, notwithstanding the effects of the weather, the mortality decreased wherever sanitary arrangements were sedulously worked. Even careful observers, sometimes, it may be remarked, refer the excessive mortality of their districts to the weather, or to some other cause over which people have little or no control. They do not bear in mind that foul air is more fatal

* Charles Kingsley's *Miscellanies*: "Great Cities."

than cold air, and that food, and clothing, and active employment keep out the cold."

It is pleasant to learn, from the same authority, previous to entering upon the second subject of our Retrospect, the displacement of population in the metropolis and large towns, that notwithstanding the insanitary state of town districts, the effects of sanitary improvements within these are beginning to tell plainly upon the mortality. Thus, "In the population of town districts exceeding 8,000,000 at the last census, the mortality was at the rate of 23 in 1000; in the country districts of more than 9,000,000, the rate of mortality was 18 in 1000; so the chances of dying in the two groups of districts were as 23 to 18." But now "the mortality of the town districts has declined from 25 to 23, and of the country districts from 19 to 18."*

The questions involved in the displacement of population in the metropolis and large towns, by the extension of railways into them, or by those internal changes commonly summed up under the term "improvements," are very complex. Even the sanitary question is susceptible of a twofold application; for, on the one hand, the clearing away of old and dilapidated blocks of buildings, and the substitution of more open areas for close alleys and confined courts, are sanitary advantages of the very highest order; while, on the other hand, the overcrowding which may be occasioned elsewhere by the displacement of population, is a disadvantage of a very serious character. That this disadvantage has been brought about in the metropolis by the structural and roadway changes which have taken place in the City from time to time, would appear to be certain from the statistical records of the distribution of the population at different periods. Thus in a recent debate in the House of Lords (March 11) upon this subject, and in the course of which the Earl of Derby moved that—

"The Select Committees of the Metropolitan Railways do inquire into and report upon the number of houses, and of inhabitants, likely to be removed by the works of the respective railways; and whether any provision has been made, or is required to be made, for diminishing the evils consequent on a large simultaneous displacement of the labouring population,"

That nobleman said:—

"I have had placed in my hands some statistics—with the details of which I shall not trouble your lordships now, as they will be printed in a few days—which show the comparative populations and number of houses in the City parishes, both within and without the walls, in the years 1801 and 1851. Your lordships will not, perhaps, be surprised to hear that the population of the City parishes was slightly smaller in 1851 than it was in 1801, there being a diminution of some 200 or 300 upon a total of 129,000 or 130,000. But it is remarkable that while the population had remained stationary, the number of houses

* Quarterly Return, February 1, 1861, p. 4.

since 1801 had not only not increased, but had actually diminished to the extent of about 3000, and therefore it appears that the same population which in 1801 inhabited 17,000 houses, were in 1851 crowded into 14,000 houses. There is something, too, which is rather curious when we look at the respective districts. In the parishes within the walls there has been the greatest decrease in the number of houses—2776; but then there has been a corresponding diminution of population in those parishes to the extent of 19,000 souls. The result is that the average number of inhabitants of each house within the walls is the same in 1851 as it was in 1801—viz., $7\frac{1}{2}$ to each house; but in the City parishes without the walls, to which the poor have been driven by improvements effected in the metropolis, I find that the houses have decreased in number about 300, while the population has increased by 19,000. Thus, while the proportion of inhabitants to each house in the inner parishes is $7\frac{1}{2}$, in the outer parishes it has increased to 9 and 6-7ths in each house. The figures which I have now quoted have reference to the year 1851, but your lordships will be perfectly aware that since then great improvements—and great improvements they undoubtedly are—have been going on in the City, the result of which has been to displace a very large number of the inhabitants. In a pamphlet published by Mr. Pearson, the City Solicitor, referring to the immense improvements which have taken place in Cannon-street, Victoria-street, and elsewhere, it is stated:—‘The noble street improvements undertaken by the Corporation have swept, and are about to sweep away thousands of industrious artisans and mechanics from their humble dwellings, to make way for the spacious streets and splendid warehouses destined in this age of progress to take their place. To supply the lack of dwellings which these clearances make, the Corporation have recently voted a large sum to purchase land and erect lodging-houses in the neighbourhood of Victoria-street.’”

The latter intention, however, has not been fulfilled.

In the course of the debate Lord Granville said, with particular reference to the extension of metropolitan railways, that it appeared to him there were only three remedies for the evils complained of: one was to force the railway companies to build a corresponding number of houses in another part of the town. Another was to organize cheap trains to carry artisans from healthy dwellings in the suburbs to the scene of their work. This, indeed, is already being carried out by agreement with the City authorities, three of the largest companies having undertaken to convey one thousand passengers per day from a distance not exceeding ten miles to London and back for twopence each. A third was, to suspend “these great works of metropolitan improvements.”

Commenting upon Lord Derby’s speech and the questions raised by it, the *Times* observed that—

“In nineteen cases out of twenty it is better a person—be it man, woman, girl, or boy—should live a good mile from his work. Of artisans’ and labourers’ villages we would wish to speak diffidently, though we see no reason—except habit and prejudice—why ten or twenty thousand workpeople should not spend the night in the country as well as their masters. But, putting this out of the question, or regarding it simply as an experiment waiting for proof, we do think that Lord Derby and his friends are wasting their philanthropy on workpeople wishing to live within a quarter of a mile of their work. If the working people of the City are compelled to find room at a greater distance

from their work, there will be builders and speculators ready to supply their wants. This is not an affair for railway companies. The Corporation of the City has tried it and failed. It requires more personal attention than any large body of men can give to it. Moreover, when any one of the great West-end proprietors lays out a hundred acres in squares and streets, he does not concern himself with the working people. They must shift as they can, and go as far off as possible. In a word, it cannot be done by law. All that is wanted is that the rules of public health should be put in force, and no lodging-houses or other dwellings allowed to be built that shall be liable to breed a pestilence. This we all of us have a right to demand, but it is a matter of dimensions, drainage, ventilation, and other internal arrangements, and does not affect the locality of the dwelling. Government, therefore, has nothing to do with providing dwellings for the poor, and has no more right to impose an obligation of this sort on railways, than on anybody who pulls down a dwelling-house to build something else—a church, for example—in its place. The interference is both idle and contrary to the usages of this country. It can end in no good: We accept railways with their consequences, and we don't think the worse of them for ventilating the City of London.—(March 12.)

These remarks of the *Times* are undoubtedly right in the main. But while accepting railways or any other metropolitan improvements, or those of any other city, it is well that the immediate social discomfort and evils they may give rise to should not be allowed to be huddled away under the easy-going proposition that “it will all come right in the end.” This the debate in the House of Lords, and the instructions which it led to, are well calculated to bring about. That the evils arising from the displacement of population, by the destruction of houses in those portions of the metropolis traversed or about to be traversed by railways, or opened out by other improvements, are at all comparable in degree with those which would arise from the same localities remaining *in statu quo*, we cannot believe. As a rule, the railways, governed in no small degree by economical considerations, penetrate through the most wretched districts—districts which are centres of all those evil influences which act most powerfully in the physical and social degeneration of the people. It needs but little experience of the inhabitants of these localities to know that they cannot be tempted to move spontaneously from them. Nay, even if improved buildings for their accommodation are erected in their midst, it is not always easy to tempt them to occupy those buildings; while the huge objection remains that the new home is, with the exception of its internal arrangements, exposed to the same pestilent insanitary evils as the old one. Now, the only method of obtaining that change which is desirable for the sanitary and social welfare of the locality must arise from such alterations as will sweep away its old structures, or at least open them out more freely to the heavens, or completely disperse or largely diminish its population. This is the great good effected by “improvements” which largely affect the houses in

the more closely and older built portions of great towns and cities. If, of course, the evils thus got rid of, or greatly relieved in one place, were immediately reproduced in an equal or exaggerated form in another, this unhappy consequence would more than counterbalance the good. But we see no reason to apprehend that this will ever be (and we doubt if it has ever been) the case. The displacement of population is generally slowly effected, and as a rule the dispersion is great; again, the changes giving rise to the displacement have always gone on contemporaneously with a steadily increasing and more perfect general and local care for the public health, so that every displacement has led to a resultant in favour of the health and social status of the community. In short, those improvements which lead to the destruction of houses in crowded localities, do for the sanitary conditions of cities and towns what else could only be obtained by an arbitrary exercise of power. They give the occasion for a better and fuller exercise of the great laws of public health; they furnish the most effective means for the internal sanitary improvement of the mass of our town populations; and it is evident that the immediate evils which they give rise to will be met by those means which most efficiently secure the carrying out of ordinary sanitary regulations in all localities without distinction. It is also evident that the new house accommodation that is required to anticipate or relieve the overcrowding induced by displacement of population should be, if sanitary regulations are to have any weight, upon the outskirts of towns. That the legislature may interfere with good to secure a right attention to sanitary requirements both in the structure and management of new buildings for the masses is probable, but that it could interfere beneficially to *cause* such buildings to be erected is very problematical.

Apropos of Metropolitan improvements, it is pleasant to find, from certain observations made in the House of Commons on the 2nd of March, that the project of embanking the Thames is not to be suffered to fall into the shade. We may perhaps indulge a hope that that great work may be commenced, if not completed, in our own time; and we may venture to look forward, without drawing too much upon the imagination, to a period when both banks of the river above Somerset House will present broad and pleasant walks in which the pedestrian may delectate. For it is to be presumed that the embankment being carried out, buildings would not again be permitted to touch the water's edge; and that, with the annihilation of the mud banks and the increased scour of the stream, the offensiveness of the river would be so greatly diminished (if not in the end, particularly when the new system of drainage comes into full operation, got rid of) that the swans would once more be tempted to flock down to the vicinity of the

bridges, and citizens would find the water side an exhilarating and healthful resort for themselves and families.

The chief matter of moment during the past quarter, in connexion with insanity, was the second reading of the Lunacy Regulation Bill in the House of Lords (*March 18th*). We quote, without comment, the observations made at the time by the Lord Chancellor and the Earl of Shaftesbury.

“The LORD CHANCELLOR, in moving the second reading of this Bill, said a great deal had been done to improve the position of lunatics by Lord Brougham, Lord Lyndhurst, and Lord St. Leonards; but a great deal remains to be accomplished. There were many persons of unsound mind possessing a small amount of property, which a commission of lunacy would wholly absorb. But unless there was a commission, the property could not be made available for the benefit of the owner. It was proposed by the Bill that, if it were made out to the satisfaction of the Lord Chancellor that these persons, who had incomes under a fixed sum, were lunatic, and if, after notice, they made no objection, the Lord Chancellor should have the power to dispose of the property as if a commission had issued and they had been regularly found insane. He admitted that it was a very stringent measure, and one which he should not propose if it were not absolutely necessary. Instances showing its necessity had been furnished by the commissioners. In 1858 a governess, at that time lunatic, became entitled to about 100*l.*, and it continued to this day to be held by a joint-stock bank, who refused to pay it over without the authority of the Lord Chancellor. The Lord Chancellor could give no authority, unless a commission found her insane, and the expense would wholly absorb the property. In September, 1858, A. B., then in a country asylum, became entitled to a legacy of 200*l.* His own funds were exhausted, and the trustees refused to apply the legacy for his benefit, because they could receive no proper discharge. There was a patient in St. Luke’s Hospital possessed of 100*l.* in a savings-bank. His wife could not maintain him. She could scarcely maintain herself. She had repeatedly requested the commissioners to appropriate the money to his use, but they had no power to do so. There were other cases to the same effect, and he hoped that if the Lord Chancellor for the time being were intrusted with the power proposed, it would be always exercised for the benefit of the unhappy lunatics. (Hear, hear.) By the present law, a person of whose lunacy there was not the smallest doubt could insist upon a second inquiry. Some years ago, a Mrs. Cuming, after an inquiry which lasted sixteen days, was found lunatic on very satisfactory evidence. She insisted on another inquiry. Lord St. Leonards saw her, and tried to dissuade her; but, whether from her want of understanding or from her being prompted by others who might have had mercenary motives, she persisted, and another inquiry would have taken place had not Providence interfered and cut her life short. It was proposed by the Bill to give the Lord Chancellor a discretion to grant or refuse a second inquiry, after having seen the lunatic and taken the best means in his power to come to a right conclusion. It was also proposed to give power to grant retiring allowances to the visitors to the extent of two-thirds of their salary. Two of the present visitors had been in office about thirty years. He believed they had done their best to discharge the duties imposed on them; but they were now of a very advanced age and physically unfitted to continue in office. It had been proposed that the Chancery visitors should be abolished, and that lunatics under the charge of the Lord Chancellor should be visited by the visitors of the General Lunacy Board. He was afraid, however, that this proposition could not be carried out. The

General Board had already more to do than they could well get through, and if there were any increase to their numbers it must be at the public expense; whereas the Chancery visitors did not cost the public anything. It had been proposed, too, in order that the General Board might take charge of them, that the Chancery lunatics should be brought together, in the neighbourhood of some central railway station; but this was absolutely impracticable. They were scattered about the country in their own houses, among their friends, or in the charge of clergymen, physicians, and so on, so that it was impossible to bring them all together. It was most essential, too, that there should be direct communication between the lunatics and the Court, and this could only be done by releasing the Chancery visitors. The only other provisions of the Bill were one for declaring that Masters in Lunacy should not be able to sit in the House of Commons, about which a doubt had been raised a short time ago; and another to make the Registrar in Lunacy a permanent officer. The noble and learned lord concluded by moving the second reading of the Bill.

“The Earl of SHAFESBURY heartily concurred in the principle and details of the Bill, which he believed to be calculated to promote the welfare of this unhappy class of persons. The cases mentioned by the noble and learned lord were merely representative cases. Many others equally striking might have been brought forward. It was not the General Lunacy Commissioners who had proposed that the Chancery lunatics should be transferred to them, for they had already a great deal more work than they could do; but it was the wish and desire of the House of Commons, as the system of Chancery inspection was so imperfect and infrequent, that the visitation should be transferred to the General Board. The Board said they would be perfectly ready, provided certain facilities were given to them. If the noble and learned lord desired to retain the visitation in the hands of the Court, he hoped that the visitors would be required to devote themselves exclusively to the work. It would not do for them to devote one-half of their time to visiting, and another part to the general duties of their profession. Their whole time, strength, and attention must be given to the visitation, otherwise the system would not attain that pitch of efficiency which the noble and learned lord desired.”

The Bill was then read a second time.

Quarterly Retrospect.

July, 1861.

THE taking of the CENSUS in the course of the past quarter claims from us the primary, although but a brief, notice, in our Retrospect. The results, so far as at present ascertained, testify to the prosperity of the country. A parliamentary paper published on the 7th June, shows an actual increase of population to the extent of 2,169,576 between 1851 and 1861—an increase greater than in any previous decennial period; but the rate of increase, owing to active emigration, had somewhat diminished.

The recent publication of the *First Detailed Annual Report of the Registrar-General for Scotland* is worthy of especial note. As might be imagined, the report abounds with interesting facts and conclusions relative to the southern extremity of the kingdom, excellently set forth by Dr. Stark, and to several of these we propose to direct the attention of our readers, recommending them, however, not to rest content with the meagre illustrations to which of necessity we must confine ourselves.

The report is based upon the returns of births, deaths, and marriages for 1855. Touching solely upon matters in which Scotland presents some peculiarity as compared with other countries, or in which more light is thrown upon questions of vital statistics, and following the order of the report, we are arrested first by the facts relating to illegitimacy. The proportion of illegitimate births proves to be greater in Scotland than in England. This singular and unexpected result was first made known through the Quarterly Reports, and it has excited no small interest. It is curious also that in the distribution of illegitimate births in town and country districts Scotland shows a marked peculiarity.

“In almost all the Continental States,” writes Dr. Stark, “whatever be the proportion of illegitimate Births among the rural populations, it is especially in the Towns that Illegitimacy acquires enormous dimensions. Thus in France, though the strictly rural population on a ten years’ average only exhibited 4 per cent. of illegitimate Births, the 363 Chief Towns of France yielded 20·8 per cent. of the Births as illegitimate, while in Paris 32·8 per cent. of the Births were illegitimate. Take another instance. In Sweden, from 1850 to 1855, in the total population, 9·3 per cent. of the Births were illegitimate; but in Stockholm, during the same period, 43·3 per cent. of the Births were illegitimate. In Scotland, however, a somewhat opposite state of matters seems to prevail, inasmuch as in the Rural Districts on the Mainland the proportion of illegiti-

mate Births is much higher than in the Town Districts. Thus, in the Town Districts, 7·1 per cent. of the Births were illegitimate; but in the Mainland Districts, the proportion of illegitimate children was 8·6 per cent. of the Births. The Insular Districts, however, proved a remarkable exception to this, and held what might almost be called the normal relation to the Towns, inasmuch as in them only 4·3 per cent. of the Births were illegitimate. This striking fact, then, of the inversion of the usual proportion of illegitimate Births in the Town and Country Districts, might induce the suspicion that Illegitimacy in Scotland and Illegitimacy on the Continent were to a great extent different things."

Again, in Scotland, the illegitimate births are almost solely confined to the labouring classes, and "the mothers of children chiefly consist of women employed about a farm or in agricultural labours, of factory girls, of domestic servants, and of persons engaged in needlework." Moreover, it is a remarkable, and as yet inexplicable circumstance that—

"Among every one of the above-named classes the tendency to illegitimacy is twice as great in the counties included in the North-Eastern and Southern Divisions of Scotland as among the corresponding classes of the great manufacturing and mining Counties which constitute the South-Western Division."

Illegitimacy, it is to be observed, curiously enough, is scarcely known among the inhabitants of the fishing villages.

The relationship observed between the distribution of illegitimacy over the surface of the kingdom and that of education, leads to one or two conclusions of remarkable interest. The returns showing the proportion of parties who signed the marriage register, make known, Dr. Stark states, the "apparently anomalous fact,—

"That the Counties which show the highest proportion of illegitimate Births are the very Counties which are in the highest condition as to education, in so far as such a conclusion can be drawn from the marriage register. And, on the other hand, the Counties which produce the fewest illegitimate births are those where education is, speaking in a general way, at the lowest ebb. This striking fact then proves that the large proportion of illegitimacy in these highly educated Counties is not a sin resulting from ignorance and debasement; for any one who is acquainted with these Counties knows how intelligent are the natives, and that as moral beings, they are if anything of a somewhat higher cast than the generality of the inhabitants of those Counties where illegitimacy is at a much lower ebb. A minute examination of the marriage returns would probably prove this to be the case, and show that the true explanation was, that while the Counties in which illegitimacy was at a low ebb abounded in improvident marriages, the superior educational acquirements, and consequent more thoughtful habits engendered thereby, prevented these improvident marriages in the Counties where illegitimacy was high, but that, unfortunately, the moral training had not been carried so far as to enable them to master their natural passions."

This is a striking illustration, derived from statistics, that much of the education in vogue is seriously deficient in the elements of a sound moral culture.

Now, illegitimacy being most common among the rural population of Scotland, it becomes an important question whether “any circumstances exist among the agricultural population of those Counties where the illegitimate Births are most numerous, which act as a bar or check to Marriage to a greater extent than in those Counties where illegitimacy is less prevalent among the rural population?” The answer to this question is most curious, and affords a singularly interesting insight into the general circumstances of agricultural life in Scotland.

“It is a well-known fact,” writes Dr. Stark, “that the smaller the size of the farm, the more it is worked with the assistance of unmarried young men and women, who are fed in the house, and either sleep in the farm-house, or offices, or, if the farm be larger, in bothies set apart for this purpose. In fact, it is only on the large farms that married men are employed; so that, in many districts, as soon as a young man marries he loses his situation as ploughman, and is forced to become a common labourer, dependent on his daily work for his daily bread. By a Return published in the Miscellaneous Statistics of the United Kingdom in 1857, we learn the number of farms in the various Counties of Scotland rated above £20, and the extent of land in each under a rotation of crops; and it is extremely instructive to see how closely, in many cases, the smallness of the average size of the farms in a County corresponds with the proportion of the illegitimate Births—the smaller the average size of the farms, the greater being the number of the illegitimate Births. Thus, in Banff, the farms paying £20 and upwards of annual rental only average 64 acres each; and it may be argued that, as a natural consequence, there can be few situations in such farms for married men, and therefore the illegitimate Births amounted to 13·6 per cent. of the total Births. In Aberdeen, the average size of the farms which pay £20 and upwards of rent yearly is only 66 acres, and hence we have 13·1 per cent. of the Births illegitimate. In Dumfries, the average size of the farms paying £20 and upwards is 87 acres only, and the proportion of illegitimate is 13·5 per cent. of the Births. In Kirkcudbright, the average size of the farms is 88 acres, and 12·0 per cent. of the Births are illegitimate. Take, on the other hand, a few of the Counties with larger farms, and on which a greater proportion of married men are employed, and compare the result. In the County of Edinburgh, the average size of the farms paying £20 and upwards is 114 acres, and among the rural population only 6·8 per cent. of Births are illegitimate. In Fife, the average size of the farms paying £20 and upwards is 110 acres, and only 6·6 per cent. of the Births are illegitimate. In Haddington, the average size of the farms paying £20 and upwards is 219 acres, and only 8·1 per cent. of the Births are illegitimate. Now, although these few startling facts convey some general idea of the apparent connexion between the size of the farms and the proportion of Illegitimacy, they fail to supply the fact which is chiefly wanted, and that is, the relative number of small farms—farms which are cultivated by the tenants themselves, or with the aid of one or two assistants. Any one can at once see from the above statement, that the state of matters on the large farms, on which alone the farm-servants are lodged in bothies, can have comparatively little influence on the proportion of Illegitimacy occurring in a County; and that it is not the large farms (which are comparatively few in number), and where the labourers lodge in bothies, but the small farms, which are laboured by the tenants themselves, or with the aid of one or two male or female assistants, who sleep in the house or offices, and are treated in all respects as one of themselves, which furnish the great proportion of illegitimate Births in the Rural Districts.”

Other facts and deductions of interest are recorded in respect of illegitimacy, but we shall simply note in addition the absolute preponderance of females among the illegitimate Births in town districts. This fact, Dr. Stark points out, "affords the strongest possible confirmation of the truth of M. Girou de Buzareigne's conclusion, as to the weakening of the physical strength in the parents being the cause why the normal excess of male Births (viz., 105 males to 100 females) is not attained in towns."

The general education of the people of Scotland would appear to be in advance of that of England. In 1855, 29·5 per cent. of the Englishmen who married during that year, and 41·2 per cent. of Englishwomen, signed the marriage register with a mark. In Scotland, the same year, there was only one County (Ross and Cromarty) in which the number of men who signed the register with a mark was so high as the general average of England; and only three Counties, Shetland, Ross and Cromarty, and Inverness, where the proportion of women who used a mark equalled the common English mean. In not a single English county did the average of those who signed the register with a mark fall so low as 10 per cent., while in no fewer than twenty-two of the Scotch counties the proportion was even below that low average; and in two counties, Kinross and Selkirk, "every man who married was able to write his name in the register."

Consumption is the most fatal malady in Scotland, cutting off thrice as many individuals as Typhus Fever, which is the most deadly of all the epidemic diseases to which Scotland is subject. The mortality returns furnish most interesting information on the immunity of the Western Isles and the County of Argyll from the former scourge. Not dwelling, however, upon the detailed report on Deaths, we pass on to Dr. Stark's observations on the influence of temperature on mortality. His remarks on this subject are of considerable interest, although we cannot help suspecting that there is some confusion in his estimation of the effects of changes of temperature upon "epidemics" and upon "mortality." The two terms are by no means convertible, as Dr. Stark would in one or two instances seem to imply. Hence it is not improbable that a fallacy lurks under his conclusions.

"That the mortality, or number of Deaths, is greatly influenced by the kind of weather which prevails," he writes, "has been long known, but till recently this subject has not received half the attention which it deserves; and yet the influence of weather, but more especially temperature and amount of moisture in the air, both in the production of diseases and in increasing their fatality, is far more striking and far more powerful than any other known cause. One fallacy, however, which runs through almost all inquiries into this subject, has been the idea that atmospheric agencies must have the same action in all parts

of the world, irrespective of climate, locality, and race. This, however, is by no means the case. That which observation may prove to be the law of the influence of weather on the mortality in Britain, will not apply to countries situated under different latitudes, or even in the same latitude, if the locality be greatly different. Each country, in fact, must endeavour to find out for itself the influence of weather on its mortality, as the laws which regulate it are modified by so many different circumstances from what they are in other countries. As a general rule, however, it will be found that countries which are adjoining, and whose atmospheric phenomena are, as a whole, regulated by the same laws, will conform more than those whose atmospheric phenomena are directed by different agencies.

"It is from neglecting to make this discrimination that we find it constantly asserted by writers, that 'epidemics seem to be generally combined with summer or hot weather;' and hence, without examining the facts for themselves, sanitary inquirers in this country repeat the same stereotyped phrase, and attribute every epidemic to the existence of fetid exhalations from drains, cess-pools, &c. Were this the case in this country, it would be found that epidemics would chiefly rage when the heat was greatest, when alone these putrid emanations are rife; but the fact stares us in the face, that, excepting one single class of diseases—viz., Bowel Complaints—the prevalence and fatality of almost all other epidemics in this country abates, and is at a minimum, during our warmest months; and the still stronger, because direct fact, is now clearly proved, that the prevalence and fatality of all the ordinary epidemics in this country *increases with the increase of cold*—increases as the supposed putrid exhalations become less virulent, or are quite arrested."

Dr. Stark then examines the progression of temperature and mortality in Scotland in 1855, and thus proceeds:—

"Now, supposing it be taken for granted that the year 1855 manifested the usual influence in temperature on the mortality of the inhabitants of Scotland—and it quite agrees with all we know on the subject—then we have not to dread an increased mortality with a rise of temperature as high as we usually have it, but we have to look in every case for a reduction in the number of Deaths. The fact is, the monthly mean temperature in Scotland very rarely rises above 60° even during our warmest months, July and August; and it is only when the temperature keeps *at or above* 60° for any considerable period, that any tendency is ever observed to an increased mortality. When the temperature, however, keeps at or above 60° during July and August, a slight increase of the Deaths is observed, solely dependent on Bowel Complaints, viz., Diarrhœa, Dysentery, and Autumnal Cholera; but in no case, so far as yet observed, dependent on other epidemics. These Bowel Complaints are the epidemics in Scotland which increase with increase of temperature; almost all the other epidemics seem subject, to a very great extent, to the same laws which rule the ordinary Deaths, viz., they increase in number as the temperature falls below 50° Fahrenheit. Unfortunately, from the want of a sufficient statistical staff, this important fact cannot be shown for 1855; but the fact has been pointed out for other years, so that there can be no doubt on the subject.

"If such be the case with Scotland, how, it may be asked, has the statement originated that epidemics, and of course increased mortality, are generally associated with summer or hot weather? If we look to the influence of season on the population of those countries which are situated in warmer latitudes, and which enjoy a continental climate, the explanation is at once apparent. With them, the cool months, as might be expected, are the healthy ones, while

the warmer months are the unhealthy ones. And even the observations made in these favoured temperate lands suggest the cause of this; for even here we find that the moment the mean monthly temperature rises above 60° , diseases are induced by the heat which prove fatal to the population nearly in the exact ratio of the rise of mean monthly temperature above 60° . The accompanying Table, showing the monthly Deaths in the City of New York and the State of Massachusetts, in the United States, for a series of years, together with the mean monthly temperature of the same years as taken at New York, will serve as a good example of the baneful effects of a rise of mean temperature above 60° on the health of the population. Here it will be observed, that while the mean temperature rises from the freezing point the Deaths diminish, as in Scotland, till the mean monthly temperature reaches 60° Fahr.; but from the moment that the mean temperature rises above that point, the number of Deaths begins to increase, and during the warmest months attains a maximum nearly double that of the cooler months, and continues high so long as the mean temperature is above 60° . As the diseases induced by a high temperature, however, take some time to run their course, the first month when the mean temperature rises above 60° does not exhibit anything like the full amount of the destructive action of the heat; and from the same cause, the cooler month, which succeeds the hot ones, contains among its Deaths a considerable proportion of those whose diseases were induced by the hot weather. Hence at New York, June, though a hot month, exhibits but a slight increase of Deaths, while in July and August the number of Deaths is nearly doubled; and it is not till the cool month of November that they have subsided so far as to allow the minimum mortality for the year to be attained. With the setting in of winter, however, the Deaths again increase, as in this country,—attaining their winter maximum in March, as in several of the Continental States of Europe. In these warm regions, however, where the summer or autumnal mortality rises so very high, the winter maximum mortality never nearly approaches that of the hot season.”

The question of founding a Benevolent Asylum for the Insane of the Middle Classes has, during the quarter, once more been revived. Fifteen years ago an attempt was made to establish such an institution, but it failed—probably in consequence of the commercial panic which occurred about that period. On the 19th of April last, a public meeting was held at the Freemasons’ Tavern for the purpose of forming a Society which might carry out the object referred to. The Earl of Shaftesbury presided, and the meeting, which was numerously attended, was addressed by the Chairman, Lord Ebury, Mr. Watlington, M.P., Mr. S. Cave, M.P., Dr. Conolly, Mr. Tite, M.P., Mr. Solly, Dr. O’Connor, and others.

In reviewing the proceedings of the Select Committee on Lunatics which sat during the two last sessions of Parliament, we commented pretty fully upon the advantages to be derived from the establishment of an asylum such as is now proposed. The subject was entered into at length in the evidence given before the Committee by the Earl of Shaftesbury and other witnesses, and, although deprecating the manner in which needless and unjust aspersions of the proprietors of private lunatic asylums were intruded into the question (an error not

even avoided in the meeting at the Freemasons' Tavern), we cordially approved of the object aimed at. It is not necessary that we should travel again over the ground we then traversed. Asylums of the class sought to be established are much required, and every effort to procure them will be certain to receive the warmest aid of the medical profession, especially of those members of it practising in lunacy, since they chiefly are acquainted with the evils arising from the want of an institution which would supply all the care of a well-regulated asylum at a lower cost than is practicable in a private asylum. There is a large class of persons, consisting of small tradesmen, governesses, clerks, literary men, half-pay officers, the poorer clergy, &c., who, under existing circumstances, in the event of mental alienation, are deprived, to a great extent, of all such assistance as would best befit their cases; for the county asylums are closed to them, as a rule, except as paupers, and private asylums are beyond their means. To supply, therefore, the wants of this class, asylums are wanted founded upon a substratum of benevolence. To attain this object is the aim of the Society happily formed by the Meeting held on the 19th April. In opening the meeting, the Earl of Shaftesbury observed that, "They proposed to begin with but a small demand. The number of patients for which it was proposed to make provision would be in the first instance but few. Perhaps, when they first appealed to the public on the subject fifteen years ago, they asked too much, and it was not intended to err in that direction on the present occasion. What they asked now was, sufficient to purchase a piece of ground with a suitable house upon it, and to adapt that house to the purpose of the asylum, commencing the experiment with only a small number of patients."

We trust that the fullest success will follow these efforts.

In 1856 some curious facts were made known, in a Parliamentary Paper, respecting the diet of the convicts at Fremantle, in Western Australia. It appeared that while our army before Sebastopol was being decimated by starvation, our convicts at Fremantle were being decimated by over-feeding. The unfortunate convict was literally over-gorged with food. After making allowance for *loss sustained in cooking*, the solid aliment he received exceeded by one pound the full diet estimated by competent authorities to be required by a labouring man in England. As a consequence, unless when he was placed under a curtailed regimen by way of punishment, the convict was constantly beset by

"Dropsies and asthmas, and joint-racking rheums."

Now, this over-gorging was no accidental matter, neither did it

arise from any misplaced kindness towards the convict. The authorities had found, in fact, that he was more readily manageable when fed to repletion. He became, indeed, exceedingly susceptible to any stint of food, and consequently the ordinary punishment of low diet proved a highly effectual curb to unruliness or obstinacy.

We are reminded of the *gluttony plague* (as it has been aptly termed) among the convicts at Fremantle, and of the reasons which led to their being over-fed, by the recent serious mutinous outbreaks among the convicts at Chatham. Popular opinion has sought an explanation of these disturbances in the theory that the convicts there are pampered. If this be true, the contrast between the results at Fremantle and Chatham are not a little curious. But be this as it may, the convict riots at the latter place have, justly or unjustly, somewhat disturbed the happy confidence we were indulging, and have expressed from time to time in these pages, in the efficiency of our convict discipline, and its immediate and prospective results. The *Times* (April 18th) has the following suggestive remarks upon the subject:—

“Signs are abroad of an impending change in the popular view of the great ‘Convict Question;’ and, indeed, it would be hard to find any subject on which the ordinary reflux of opinion has been delayed for so long a time. The social history of this country has been called a history of reactions, and, though the description is exaggerated, it is not without a basis of truth. It is in our nature to obey one impulse after another, but the fact is that in this particular instance there have been but two currents of feeling, and the reaction has been long and steady, because the action which produced it was proportionately forcible. From the earliest times up to the reign of King-George IV. we treated not only our convicts, but even our prisoners often with great inhumanity, and always without the least consideration. It can hardly be said that the system was much mended either by the inquiry which Hogarth has commemorated, or by the noble efforts of the philanthropic Howard. Things remained almost as bad as they could be till the days of Wilberforce and Romilly. The gaols, indeed, grew somewhat better, but the gallows still offered the chief release from the gaol. In front of those black walls of Newgate men and women were strung up by the half dozen, and the visitors to that grimy old prison may listen to St. Sepulchre’s chimes as Ranald MacEagh listened to the alarm rung out from Argyll’s castle, and think of his remark to Dugald Dalgetty, that ‘at the sound of that bell many a brave man had yielded up his soul.’ In fact our Convict Question in those days had but two solutions—Botany Bay and the halter. There was a cruel simplicity about the system. Society cared a good deal for itself, nothing for its sinning members. The mischievous classes were put out of the way with little trouble, and even less compassion. Perhaps they were transported, perhaps they were strangled; but in either case they ceased to be troublesome at home. True, the crop of crime always ripened afresh, but the sickle was as ready as ever. Nobody concerned himself either about gaols or gaol deliveries, about reformation, classification, or superintendence. ‘So,’ as Mr. Dickens says in the latest number of his latest work, ‘felons were not lodged and fed better than soldiers (to say nothing of paupers), and seldom set fire to their prisons with the excusable object of improving the flavour of their soup.’

“With the mitigation of the criminal law came the turn of the tide which

has been flowing ever since. Capital punishment was gradually disused till it became the penalty of murder only, and not always of that. Still, we transported our criminals freely beyond seas until a fresh obstacle was encountered. Our colonies refused to receive these tainted cargoes, and we found ourselves compelled to keep the culprits at home. Then came Penitentiaries, Convict Prisons, and other establishments of the like character, followed by Reformatories, Model Gaols, and a variety of institutions for improving criminals and eradicating crime. As convicts could no longer be either hanged or transported, and as it would not do either to let them loose or keep them locked up for ever, the only alternative was to reform them, and we set about the work, not only for humanity's sake, but because there was nothing else for us to do. But when the current of public feeling had once set in this direction it naturally overflowed its bounds. So much was done for our prisoners that they became better off than honest men, and theft led to comfort by a shorter road than industry. The latest phase of the affair is a convict revolt, created apparently by a fine stimulative dietary, *apropos* of which an intelligent official writes to us much as Paterfamilias writes about Eton, and represents that criminals should not be crowded together in such large numbers, but be distributed, as it were, into snugger classes, and under more tutors or superintendents.

"However, there is a change impending at last, and a stronger sign of it could hardly be found than in the tone adopted by so known a philanthropist as Mr. Charles Dickens. It is curious enough to find the author of *Barnaby Rudge* penning such a sentence as we have quoted above, but the feeling is perfectly justifiable, and the only question is what to do next. Our readers have already learnt something of the conflict between the English and the Irish 'Convict Systems,' and have seen that the officials are firmly convinced not only of the humanity but of the 'success' of our recent courses. We believe, indeed, that up to a certain point their opinions are defensible. We have no doubt that many criminals have repented in our Penitentiaries, and been reformed in our Reformatories, but we are perfectly sure also that in many cases all our care has been thrown away, and we feel by no means easy about the numbers of convicts who are periodically turned loose upon society, to sink or swim. According to Sir Joshua Jebb's statement, about eight go right where one goes wrong, or, rather, only one out of nine can be shown to have relapsed. This is certainly not a result to be ashamed of, but there still remains the percentage of incurables, and it is with these that we are mainly concerned. In a few words, our belief is that a certain proportion of convicts is, and always will be, utterly irreclaimable by any measures we can adopt at home. We do not believe in any possible progress either of the 'English' or the 'Irish' system by which these men can be reformed. We think that they will continue to defy our efforts and produce an immense amount of evil, and we consider that in their interests as well as our own, they should be sent off to some of the districts of Australia where the settlers seem still to be not only willing, but anxious to receive them.

"Let the reader only look at the cases which are perpetually repeated in our Law Reports—at the proceedings, for instance, at the Middlesex sessions this very week. After a prisoner is found guilty, inquiry is made, as a matter of course, respecting his previous doings, and it frequently transpires that he has been tried and sentenced half-a-dozen or a dozen times before. No fewer than fifteen convictions were proved on Monday last against a young lad of eighteen, and we have seen cases in which that number was doubled or even trebled. Now how is it to be expected that such characters as these should yield to the discipline of Reformatories or Model Prisons? It need not be assumed in every case that there is some portentous degree of vice to be overcome. There is, perhaps, nothing of the sort, but there is something still harder to deal with—the

spirit of an attractive profession. These inveterate offenders are experts in their craft. They are skilled labourers of the highest pretensions. A set of housebreaking implements produced before the Assistant-Judge on Tuesday were such models of artistic manufacture as to fill even the police with admiration. Depredation, in fact, has been refined into an art, and every art has its slaves. It is hopeless to expect any better things from these unprincipled proficientes so long as they remain at home. They prey upon the community by irrepressible instinct until they are detected; when detected they take the chances of trial; when sentenced they accept their penal servitude, knowing that it will have an end; and when released, probably by a premature discharge, they return to their malpractices with greater zest than ever. These men constitute that ugly percentage of convicts with which nothing can be done—the true blackamoors of the system who can never be washed white. Here it is, and perhaps here only that we fail. We can do an infinite amount of good by prevention—witness Ragged Schools and ‘Industrial’ Institutions. We can do some good by cure where nature happens to be favourable and disorder has not gone too far—witness the reclaimed delinquents to whom Sir Joshua Jebb points with such justifiable pride; but there are cases in which we can do no good at all—witness the scores of offenders brought up for their fortieth or fiftieth offence, and our best course would be to ship off these incurables to a land where they might do some good, and where, at any rate, they could do no harm.”

Among the criminal events of the quarter several murders are recorded, committed apparently by lunatics. The consideration of these cases, however, we postpone until after the trials of the murderers.

The following singular and novel illustration of the criminal propensities observed among the insane, is of considerable importance to the forensic physician, and we place it on record without curtailment, adopting the report contained in the *Daily Telegraph* of April 5.

“At the Birmingham Quarter Sessions on Wednesday (April 3), a young woman who gave the name of Eliza Davis, described as the wife of a respectable professional man in Birmingham, but whose real name did not transpire, was charged with having, on the 28th of February last, feloniously and by fraud taken away a child, the son of John Doon, with intent to defraud the said John Doon of the possession of the said child; and also with having on the same day feloniously taken away a young child, the son of John Brown, with intent to defraud the said John Brown of its possession.

“Mr. Manley Smith appeared for the prosecution, and Mr. O’Brien, instructed by Mr. Edward Powell, for the defence.

“In opening the case, which was of the most extraordinary character, Mr. Manley Smith said it was laid under the 9th Geo. IV. cap. 31, sec. 21, by which, if any person maliciously, by force, or fraud, deprived a parent of the possession of his child under ten years of age, he or she was made guilty of a felony, and liable to transportation. He then proceeded to detail the circumstances of the case, after which he called

“Eliza Macarthy, who said she was the wife of John Macarthy, shoemaker, Henrietta-street. On the 28th of February she saw the prisoner at the gates of the Snowhill Railway Station, when she was asked by her if she had seen a woman with a baby, and said she had not. The prisoner then asked if witness knew any one with two babies, and she said she did not. Prisoner accompanied her towards home, and met a woman at the corner of the entry, to whom she said something about two children, and that any one who would find them

would do her a favour. That was about seven o'clock in the evening. The woman they had met said there were children in the street, and took her to Mr. Brown's door. The prisoner went in and asked if Mrs. Brown was newly confined. Mrs. Brown was in bed, and the child, which was a month old, was with her. Witness did not hear the whole of the conversation, but Mrs. Brown said she was afraid to let the child go, and to trust it with the prisoner. Brown then went out, and soon after came back with Mrs. Doon and her child. When they came, prisoner said she would rather take the two children; and Brown said, 'Let us be quick about it, and get it over, as it is getting late.' After prisoner went up-stairs she said she had been seduced by a gentleman at Liverpool, was pregnant by him, and had told him that she had had twins. Prisoner said further, that he wanted to see the children, and he would give her 1000*l.*, and take her home to her father and mother. She said she would not want to keep the children more than half an hour. When Brown had agreed to let the children go, witness carried Brown's child, Mrs. Doon carried her own child, and Brown went with them to Nock's dining-room. Prisoner went in first, and came out almost immediately, and said he was not down-stairs. She then went up-stairs, and soon returned smiling, when she said he was up-stairs, but was deep in conversation with another gentleman, and seemed frightened, and said, 'Jemima, are you going to have me taken? What are all these people about you?' She also said he had told her to walk down to the New-street station. Prisoner took the baby witness had been carrying, and they all went to the station, where witness and Brown went to one side, and the prisoner and Mrs. Doon on the other. Witness never saw the prisoner afterwards, as she made her escape with the children.

"Cross-examined: Prisoner was very anxious about the child, and cried when she thought Brown would not let her have it. She said one child would do at first, but when she saw the other one she said she must have them both.

"The husband of Mrs. Brown and Mrs. Doon were then called, and confirmed the facts above stated, connected with the application of the prisoner to be allowed to take the children, and her subsequent disappearance.

"Mr. Hawkins, carpenter, Tenant-street, said that on Friday, the 1st of March, about one o'clock in the morning, he heard some children cry, and looking out he saw the prisoner with two children. He asked her what she wanted, and she said she would tell her business if Mrs. Hawkins would go down to her. Mrs. Hawkins went down-stairs, and finding that both the prisoner and the children were very cold, made up a fire, made the prisoner some tea, and fed the children. The prisoner said she had been confined at the Birmingham Union, and that she had left with her two children because she could not bear to have them confined in a separate room. In a little time the prisoner made several excuses as reasons for going out without the children, and Mrs. Hawkins became suspicious that she wanted to leave them. Prisoner said that her parents were named Hill, and lived in the Hagley-road, and that she had been seduced by a young man, a pearl button maker. She had gone to the Union to be confined, so that her father did not know of her shame, and that she durst not take the children home at once lest he should beat her. She therefore asked to be allowed to leave her two children with Mrs. Hawkins until she had been home and explained the matter. Witness would not agree to this, but said that if the prisoner would stop till a reasonable hour next morning, Mrs. Hawkins should go with her home, carry one of the children, and see what her parents would do for her. The prisoner objected to this; and having had the children warmly wrapped up, she left the house of witness with them about half-past five o'clock that morning.

"Mrs. Dugmore, Harborne, said that about a quarter after seven o'clock on the morning of Friday, the 1st of March, the prisoner came to her house with two children, which she wanted witness to nurse for her. She said they were

the twin sons of her sister, who had died a month before; that they had been with another nurse, but when she went to see them they were in such a neglected state that she at once took them away. Witness said at first that she could not take them, but at last agreed to take them for a day or two. On the Saturday night prisoner sent a cab for her, and met her at the Five Ways, when she said the children were her own; that she had been confined at the Union; that a lady was going to give her 50*l.* for one of the children; and that she was going to have the other nursed by a poor woman. Witness said that she could not keep the children under such circumstances, and the prisoner said she would send for them on Sunday or on Monday at the latest. On Saturday the parents of the children came to her house and took them away.

“Mr. O’Brien, for the defence, said there could be no difficulty in this case, as the jury saw before them, not a criminal, but a woman who was greatly to be pitied, as she was suffering under a mental derangement. She was the wife of a respectable professional man, had a comfortable home and an affectionate husband, but unfortunately was at times subject to such fits of delirium as that under which she had in this case taken away the two children. The very cunning which she had exhibited in every stage of the affair was only, as must be seen by every one of them, the cunning of madness. He then called

“Mr. Bull, who said he was a surgeon, living in Birmingham. He knew the prisoner, whose name was not Eliza Davis. She was the wife of a medical man in this town, had a good home, an affectionate husband, and three children living. Witness had attended her professionally in her confinements. Her youngest child was about two years old. On various occasions she had suffered severely from mania; and witness had attended her several times for affections of the brain, when her husband had called him in. On these occasions she exhibited indubitable symptoms of derangement. When about to be confined, she had on two or three occasions contrived to get every one out of the way and make her escape; she had twice been confined away from home in that way. From what he had heard said by the various witnesses, he should say, without the slightest doubt, that at the time she took away the children she was insane.

“Mr. William Moseley Richards said he was a surgeon, living in this town. He had known the prisoner for some time. She was the wife of a professional man in Birmingham, and had a comfortable home. Within the last two years she had repeatedly been in an insane state of mind, the symptoms of which were a partial incoherence, restless manner, strange language, in short, similar to those produced by delirium.

“In summing up, the Recorder said it had been clearly proved that the prisoner had brought herself within the meaning of the Act of Parliament, but there did not appear to be any doubt but that she was insane.

“The jury acquitted the prisoner on the ground of insanity.”

The following is a summary of a remarkable case of suicide and attempted suicide which occurred in Paris at the close of last year, the judicial proceedings connected with which terminating in the present quarter. It illustrates a state of society and feeling almost peculiar to our neighbours.

Corporal Rouard had filled the office of librarian to his regiment, and his seven years' term of service having expired, he voluntarily determined to serve for another term, and received the re-enlistment of 1,000*l.* Finding himself in possession of a sum of money such as he never saw before, and never could hope to see again, he determined to “knock out life” with it as long as it lasted. The story of his saturnalia is told by the following summary of the

report of the advocate-general to the Paris court-martial :—"On Dec. 2 last Rouard made the acquaintance of Denise Herbin, an artificial flower maker—a pretty girl, only seventeen years old—at the dancing rooms called the 'Grand Salon,' in the Faubourg Poissonnière. Rouard had a lodging in Paris, in which he installed Denise, and he gave up to her every moment that he could spare from his military duties. As long as his re-enlistment money lasted, which was only a few weeks, they led a joyous life, and troubled their heads little about the future. He had been guilty of deceiving her as to his position in life; for, instead of admitting that all the wealth he had in the world consisted of his re-enlistment money, he had represented himself as having some private income, and had promised to allow her permanently 50*f.* a month. This made it the more painful for him to break with Denise, which he felt it absolutely necessary to do. On the last day of his leave of absence, he began by asking her, "In what way do you love me?" She gave a true woman's answer: "I love you because I do love you." He afterwards repeatedly told her that she must leave him; but they at length agreed to die together. They made up their clothes into separate bundles, which they ticketed with the names of the relations whom they intended to have them, and then Rouard wrote three letters: one to his father, another to his sergeant-major, and a third to a sister of Denise, announcing their intentions. Denise asked Rouard what sort of death they should die? "We will die," he replied, "as we began. We were first intimate at the Cadran Bleu, there let us finish our career. I will plunge the poniard into your bosom, and I will then draw it out all bloody and stab myself." Rouard says that by drawing this bloody picture of death he hoped to frighten her and divert her from her purpose, but that she, far from being daunted by his words, flung herself into his arms in ecstasy, exclaiming, "I could never have hoped for such an honour." At six in the evening, Rouard accompanied Denise to the shop where she worked, that of Madame Vielle, artificial flower manufacturer, Rue St. Denis, and there she distributed her working tools among the shop girls, kissed them all round, took a solemn leave of them, and raising her hand in the way which French people do when they take an oath, said, "I swear before God, and by the ashes of my mother, that I am going to kill myself." The people in the shop, who had always looked upon Denise as rather flighty, did not for a moment suppose that there was anything serious in this oath. On leaving the flower shop, Rouard and Denise went to the Bal Robert, where they danced till nine o'clock, and then went to the Cadran Bleu; but finding that establishment closed, they proceeded to Michel's Restaurant, nearly opposite, and asked for a private room, pens, ink and paper, and supper. On entering the private room in the restaurant the poniard was placed on the table, and Rouard said to Denise, "The truth must be known after us; I should not like to be thought an assassin." Thereupon Denise wrote, "I die, struck by the hand of my lover; I have ordered him to do so because I wish to die with him;" and she signed her name. Rouard wrote underneath the following words: "I stab my mistress because she wishes it. I die with her because such is my will." After supper, and when the minute hand of the clock pointed to eight minutes to eleven, which was the exact hour they had fixed upon for the completion of the drama, Rouard said, "The hour has come." Denise then laid down upon a sofa, undid the upper part of her dress, and bared her bosom. Rouard took the poniard, advanced towards her, and said, "It is yet time,"—meaning to ask if she would change her mind. She replied, "Go on; and, above all things, don't make me suffer." He then placed one knee between her legs, pushed up with his left hand her left breast, and plunged the weapon into her body up to the hilt. She heaved one sigh, closed her eyes, and remained motionless. Rouard drew out the poniard, and, while warm and bloody, as he had said, inserted the point into his own bosom; he then placed the handle against the

body of Denise, and folding his arms around her, pressed her against it with all his strength. It was deposed by witnesses (for Denise did not die on the spot) that she subsequently affirmed, when in the hospital, that, "feeling her lover tremble, she pressed herself against the handle of the poniard as hard as she could, in order to help to drive it home." After this Rouard fainted and fell off the sofa. When he came to himself, and sought to collect his ideas, he felt an acute pain in his breast, and found the poniard sticking in it. He drew it out, laid it on the table, and then sat down on the sofa where Denise was lying. It being now late, the waiter knocked at the door of the room, and Denise had strength enough to stretch out her hand from the sofa and draw the bolt. Both Rouard and Denise, severely wounded in the lungs, were removed to the Hospital Saint Louis, where Denise lingered for twenty days. Rouard sufficiently recovered to take his trial. A case of the above kind commonly results in a triumphant acquittal before a French jury. A court-martial, however, might be supposed to be made of "sterner stuff." In this case, however, the majority of the military tribunal showed itself susceptible of those feelings which, though admitted by no civilized code, generally give impunity to crimes of this nature in France. Rouard was acquitted by five votes against two. His mother, who was in court, loudly thanked the judges, and there was a general shout of applause.

We conclude our Retrospect with the judicial record of an instance of superstition and crime almost unparalleled in the present day. The particulars were communicated to the *Daily Telegraph* (April 3) by a correspondent at Gratz. He writes :

It seems that a few months ago, a peasant of the name of Lauder appeared before the district court of Leoben, in Styria, on the charge of having murdered a certain Frau Catherine, whom he believed to have been a witch. A second peasant, whose name is concealed under the initial R., was accused of having abetted the other by advising him, on the faith of a pack of cards, to commit the deed. Lauder is a young man of 27 years, the father of a family, and of respectable antecedents. R., an old beggar, aged 75, who appeared in rags before the court, looked, it is said, as much a sorcerer as the poor victim of his superstitious practices.

On being called upon to reply to the charge, Lauder spoke as follows :—

I ask your pardon, gentlemen of the court, for not being able to tell the story in a very connected manner. I always suffered from a bad memory, in consequence of my father having beaten me too much when a boy. When four years old, I was put to work, and on one occasion, as I have heard from my mother, he knocked me down, and so hurt me that I was laid up for a long time. After his death, my mother married again, but my step-father behaved still worse, and several times was very near being the death of me.

President of the Court.—I should wish you to come to the point, and tell us how you were the death of Catherine.

Lauder.—I killed her, because I had been ill for a long period. Gentlemen, I beg you will give me time. The fact is, I have always been ill. My wife, being very skillful in charms, she cooked different sorts of herbs for me, which made me better. Some time ago, when suffering from a swelling in the eye, a cobbler advised me to look for the bone of a dead animal in the fields, when the moon was on the wane. When I had found it, I was to take it up with my handkerchief, and cross it three times over my eye. I was lucky enough to meet with a bone, and, doing as I was ordered, my eye soon got well. I have a right, then, to believe in charms. But, on returning a shoe which I had mended for Catherine, the swelling came back. Directly I entered her room I felt a sharp pain in my leg, which ran up to my head, till I could hardly bear it any longer. I told my wife that, after all, there might be truth in the "planet

book," which, on looking after my name, and comparing it with the position of the stars, clearly showed that I had been bewitched. My wife, who knew all about these matters, advised me to go to R. for advice. She is a clever woman, I must tell you. Once, when the goat was losing its milk, she boiled a pot full of it while the bells were ringing for prayer, and the goat soon got back its milk. I therefore entirely relied upon my wife's opinions, and went to the man R., the same who had correctly foretold the death of my father-in-law. On consulting the cards, R. was speedily convinced that Catherine was the witch who had buried a "nail of death" in front of my house. We went to the spot, and dug up all around without finding the nail. I then told R. that I did not want to know anything but the real truth. He looked again at his cards, and after some time gave it as his opinion that she had poured out water in the form of a cross, calling my name all the while with curses. He also counselled me to go to the old witch and beat her severely, when, perhaps, she might be prevailed upon to undo the spell. My wife objected, but on R. saying that this was the only means of recovery, I at last resolved to go and do as I was bid. Gentleman, when a worm defends its life, it is natural that I should not give up mine without a struggle.

On Catherine opening her door, I instantly called out to her, "You cursed witch! why have you charmed me, who never did you any harm?" She replied, "Nor have I ever done you any harm." Well, as R. was certain that she had committed the mischief, I caught her by the hair, and knocked her down. Catherine begged and prayed for mercy, saying that she would undo the spell if I would let her off. Upon which I asked, "Will you really let me off?" when she said, "I have never done you any harm." This put me in a great passion, as I cannot bear lies. Thinking that I should compel her to keep her promise, I beat her to death. I was in my senses all the time.

President.—Was any one else present?

Lauder.—Yes, there was a stranger. The man said that he had never believed in witchcraft until he saw a man in Austria (the Archduchy) who was wasting away from being bewitched. The man also acknowledged that I was in the same case, and regretted that he could not undo the charm.

President.—What did you do after killing her?

Lauder.—I went home with my wife, who had been waiting in front of the house. I did not think that I had quite killed her, but, to make sure, asked R., who had also been waiting outside. He could not tell till he had looked at his cards. "She will come round again, you may be sure," he said; "such a witch has a devil in her, and is not so easily killed." But as I had my doubts about the matter, I proposed to go to the priest and have a mass read for her soul; and though R. advised me not to tell any one, not even the priest, I didn't mind him, and went. When I had told him what had taken place, he said:—"You stupid man, how can you believe in witches? If you do that, masses are of no avail." I then asked what I should do, when the priest replied, "You had better go and look for the doctor." I did so; but, on going with him to Catherine's house, another doctor met us halfway, and said that she was already dead. I was rather unwell that day, but on feeling a little better towards the evening, I thought I might as well go to the police office, and give an account of it all. But on second thoughts, being pretty certain that the police would come to me, I stayed at home. And they did come very soon.

President.—And had you no notion that you were doing wrong by killing the woman?

Lauder.—I thought I might defend my life, when she was going to take it. If a robber were to attack me, there is no doubt I should be allowed to keep him off; and am I not to be allowed to save my life, when somebody is going to murder me? Besides, I did not mean to kill her, but merely intended to give her a good sound beating.

President.—Every person in the village says that she was a particularly good-natured woman. Did you not know this also?

Lauder.—My wife, who is very clever in all these things, assured me she was a witch. Somebody had told her on the Alps that Catherine knew how to change horsehair into otters.

Public Prosecutor.—On another occasion you called R. a cheat and a deceiver, because, immediately after the commission of the crime, he proposed a different method of attaining the same object.

Lauder.—That is true. He advised me to cut the top of three juniper bushes, to lay them crosswise under a large stone in front of my house, and pour over it some Midsummer-night's wine.

Public Prosecutor.—And do you still believe in such charms?

Lauder.—No, I do not. The fact is that that man R. has been making a living out of such practices for many a year. He told me also that if he did something in front of my house, and then repeated the Lord's Prayer three times backwards, I was certain of being a dead man within a year. Collier Fritz, they say, is also a man that can undo charms.

President.—Do you think your deed was a good and right one?

Lauder.—Had I known that it was wrong, I should certainly never have committed it.

The President then proceeded to the examination of the old man R., the accomplice, who, among many other things of minor importance, deposed as follows :—

R.—The cards told me that a nail of death had been placed before his door by a witch. I instantly suspected Catherine, having heard her threaten the priest's cook with witchcraft on another occasion. Soon after the priest's cows fell very short in their milk.

President.—Are these the cards you used on the occasion?

R.—Yes, they are.

President.—How long have you had them in your possession?

R.—Not very long, and they were not consecrated by the priest. Another pack of cards, which I had owned for a long time, he consecrated for me.

President.—You must show us how you proceed in consulting your cards.

R.—Good heavens! I am too much frightened just now.

However, he took the cards, selected three from the pack, and shuffled them again with the others. He then requested the secretary of the court to cut them three times, and, sorting them in four rows of eight each (German packs contain but thirty-two cards), declared the second card in the first row to represent Catherine, and the second in the third row to stand for Lauder. "There you see that," he adds triumphantly, "they are again together." He cannot, however, find the nail of death amongst his mysterious pack.

President.—Do you believe in the existence of witches?

R.—When I was a little boy I recollect seeing a witch riding down from the clouds during a great thunderstorm. The peasants then caught and shot her on the spot. I therefore believe in witches.

President.—Why did you advise Lauder to beat and maltreat Catherine?

R.—I only told him to beat her a little.

President.—But as Lauder and his wife asked you for another remedy, why did you insist on the beating?

R.—I did not know of any other, and I firmly believed that it would effect the cure.

Lauder was sentenced to be imprisoned for life; the verdict upon the other criminal is not given in the papers.

Recitals like the foregoing enable us better to comprehend the feelings which actuated individuals in the darker and more superstitious periods of history.

Quarterly Retrospect.

October, 1861.

"WE have lately," says the *Times* of July 23rd, "been breakfasting full of horrors. On a glance at our columns, one might think that every possible atrocity had been committed or charged within these few weeks. If all is not true, it only follows that the imagination is quicker than the hand. It is of no use to conceal that human nature has a positive appetite for the horrible, so we will address ourselves at once to this universal infirmity. What will you have? Crimes of the worst dye lie in profusion before us. A father inflicting murderous blows on his only son! Two gentlemen shooting, hacking, and smashing one another to death in a back drawing-room in a bye street in the Strand! A surgeon charged with a professional murder upon an unhappy patient! Several husbands murdering their wives! A lady attacking her aged mother with a bludgeon! A boy stabbing his schoolfellow! A poor girl impaled by a runaway horse on the railings of Eaton-square! Several acres of conflagration, and the superintendent of the Fire Brigade and a friend crushed to death on the spot! A duke, a minister, and a bishop all dangerously ill (the two latter now, alas! dead) in the prime of life! What next? Is this *apropos* of the civil war in the States? The mail, by-the-bye, informs us that the wife of a great American poet has been just burnt to death. Was there really something 'disastrous' in the tail of the comet which they say swept the earth three weeks ago? Or is there such a thing as a run in calamity? Misfortunes, they say, never come single. *Kinglake* says, that in the Levant there are more horrors perpetrated towards the end of Lent than at any other time of the year, owing to the increase of brain disorders and morbid fancies, by inanition. But, perhaps, this is a contagion rather than an epidemic, and people's minds are just now screwed up to horror pitch by all they hear about them. There are now a dozen performers on the tight-rope, ready to perform over fountains or flames, over waterfalls or houses, and do anything that nobody else has done. There appears to be the same competition in crime."

"What is the matter with society," exclaims the *Daily Telegraph*, later in the quarter (August 5th), "what maleficent influence has overshadowed us? On every side, in every quarter of the land, we hear of deeds of horror. There seems an increase in crafty and inge-

nious offences, in polished knavery, in refined and smooth-faced immorality. We have reverted to first principles—to the principles of CAIN, the earliest murderer. Every day in every week, we read of some fresh crime of outrage and violence, of frenzied passion, of deliberate and sanguinary ruffianism, of gorilla-like ferocity.” Here a husband murders his wife and then himself, there a wife murders her husband and then herself; here a mother poisons the whole of her children and next herself; there a child beats out his mother’s brains and then hangs himself; here two lads torture a little child to death as they would have done a fly; then a soldier deliberately shoots his colonel and a captain of his regiment in the barrack-square. Add the spectacle of two crowded excursion trains rushing swiftly to destruction, and a succession of terrible conflagrations, and we complete the catalogue of horrors which have fallen upon the quarter.

“Life struck sharp on death makes awful lightning.”

Amid all this confusion of horrible events, there is at least one lesson clearly to be learnt, and to this as falling entirely within our special province, we shall confine our attention. UNRECOGNISED LUNACY has played no inconsiderable part in the terrible series of murders at which we now stand aghast. We can do no better, no more useful service than bring together the different instances of murder perpetrated by UNRECOGNISED LUNATICS, which have come under the notice of our Courts of Law in the course of the past quarter. It is highly probable, from the histories of the cases, that several of those horrible murders recorded in the newspapers, which were followed by the suicide of the murderer, were the handiwork of unrecognised lunatics; but the following cases are alone sufficient, without calling upon the imagination, to show that we have here to do with a highly important, even if it be a restricted, social problem. We shall presently see, however, that Unrecognised Lunacy, even when regarded only in its criminal aspects, is not of moment solely as one of the fostering causes of murder.

It will be as well to premise, perhaps, in order to escape the too commonly perverse tetchiness of public feeling on the plea of insanity in cases of murder, that we are not recording these cases with reference to that plea. We are wishful to make plainly evident one of the most formidable evils which arises from a neglect of those signs which mark incipient disorder of the brain or the mind, and from a system of legislation which renders the early treatment of lunacy almost an impossibility.

The Summer Assizes having been held during the quarter, several of the subsequent cases bear date previous to the past three months.

MURDER.—On the 26th of March, a young woman named Diana Wickens, aged 20 years, was murdered while asleep, by her step-sister, a married woman,

the wife of a sergeant-major in the 3rd Regiment of Royal Surrey Militia. The event took place under the following circumstances, at the Militia barracks, Kingston-upon-Thames. It would seem that the husband of the wretched woman, who is highly respected by his officers, had left his bed about 7 o'clock in the morning, and gone out into the barrack-yard, leaving his wife in her own bed and the murdered woman in an adjoining room, where she slept upon a temporary bed, made up for her upon a sofa, and his wife must have got up almost immediately, taken one of her husband's razors from the drawer in which it was kept, and then proceeded to the adjoining room where her step-sister was lying. There appears to be little doubt that at the time she was asleep and lying on her left side, and while in that position the murderess inflicted a dreadful wound upon the right side of the neck, dividing the right carotid artery, the jugular vein, and windpipe. Instantaneous death would not appear to have been the result, for there is very little doubt that upon the first sensation of pain the poor creature raised one of her hands, and in so doing received a severe injury upon the fingers. She then got out of bed and staggered for about six feet into the adjoining room, where she fell dead, literally covered with blood. After committing the dreadful deed the wretched woman went out to the barrack-yard, where she met a sergeant belonging to the regiment, named Oates, to whom she at once stated that she had murdered her sister, and she then went to the pump and washed her hands, which were covered with blood. To another sergeant who had hastened to the scene of the murder, on the alarm being given, she exclaimed, "I have murdered her;" and again, "Oh, I didn't do it; I couldn't do it;" and he stated that she appeared to be hardly capable of knowing what she was doing. To the policeman who arrested her, she said, "I have cut that young woman's throat, and you must take me to the station;" and at the police-station she exclaimed, exhibiting the utmost horror and repugnance at what had taken place, "This is a shocking thing I have done; I must have been insane, or I could not have done it to a sister I loved so well." The surgeon who was called in at the time, Mr. Cory, of Kingston, stated in evidence before the magistrates, that when he entered the room in which the crime had been committed, the prisoner said, "Oh God, doctor, if I had had your advice before, this would never have happened." He said also, that he had attended her in the June previous for a diseased liver. She was then very ill, but recovered, and he had advised her to keep herself quiet and free from excitement. When he saw her on the morning in question, she appeared to be in a state of dreadful excitement, her hands were cold, and her countenance was quite horror stricken. During the examination before the magistrates, the prisoner, who was a very tall, powerful, and rather plain-looking woman, seemed to be in dreadful distress of mind, and she repeatedly interrupted the proceedings by hysterical sobs and the most distressing ejaculations, saying, "Oh, it is not true! it cannot be true!"—"Oh, no, no, no! it cannot be true! oh God, oh God!"—"No, no—yes—a dream, a dream."—"Oh, it is not true, it is not true! it cannot be—it is a tale of fiction, and not a reality! If it is true, pray for me, pray for me! Oh, let me retrace my steps to my home! I am sure it cannot be!"

No motive whatever could be ascertained for the commission of the crime.

MURDER (CHILD).—About the termination of March (see *Times*, April 4), two children, aged respectively 5 and 8 years, were murdered by their mother, the wife of a coal-carter, at Edwardstone, near Sudbury in Suffolk, under the following circumstances:—The children were taken by her, together with an infant, a distance of half a mile, to a thick wood, where there is a large pond ten or twelve feet deep, and here the two eldest appear to have been forcibly held under water until they were drowned. The infant was destined for the same fate

but some boughs stretching into the water supported it, and it was not sufficiently submerged to perish. The woman herself then walked into the water up to her neck, and, taking the children out, laid them on their faces on the grass by the side of the pond. She afterwards walked home and told a neighbour that her three children were drowned, but that she believed one was still alive. At first it was supposed that the children had met their deaths accidentally; but the woman herself subsequently made the following statement to the police constable who was called in:—"I took the little girl (the youngest and surviving child) and threw her into the pond; but she could not sink because she hung on the boughs; and as soon as I had done that, I saw the two other little dears in the pond and I rushed in after them. As soon as I got into the pond the cold water struck me, and I came to my senses and dragged the two children, now lying dead, out. The little one I took out last. When I got it out I saw it breathe." She also said she did not know which way she went to the pond or which way she came home, adding, "If I did do it, I don't know anything about it." It will be seen from this that the poor creature's language and demeanour is incoherent, and she has been, it seems, in a high state of nervous excitement for the last six months, imagining herself, without any adequate reason, to be labouring under various diseases. The younger of the two dead children had a contusion of the forehead, and the arms appeared to have been squeezed; there were no contusions on the other one, but similar marks were observable on the arms, as if they had been pressed or nipped.

MURDER (CHILD).—OXFORD CIRCUIT.—Before Mr. Justice KEATING.—Catherine Oliver, 47, tailoress, was charged with the wilful murder of her little girl, Matilda Oliver, aged three years, on the 25th of May, 1861, at Bristol.

It appeared from the evidence that the prisoner was the wife of a poor labouring man, living at No. 4, John-street, Bristol. She had had twelve children, but six of them had died, and the charge now made against her was that she had murdered her youngest child, a little girl three years of age, by hanging her to a bedstead, on the 25th of May last. At about half-past twelve o'clock in the day a neighbour who lived opposite, as she was sitting at her window, saw the prisoner return home to her lodging with the little girl, a very nice interesting child, three years of age. At her door the prisoner took her child up in her arms and kissed her several times, and then went into the house. In about ten minutes she came out of the house alone, and having locked the door and looked into the window of the parlour in which she lodged, she went straight to the Central Police Station at Bristol, and gave herself up to a policeman there, saying, "I am your prisoner." The policeman asked, "What for?" and she replied, "For hanging one of my children." The policeman asked her what made her do that, and she said, "It is all through the ill-treatment of my husband for the last three years." She then gave the policeman a key, and said that if he took the key and would go to No. 4, John-street, he would find the child. The policeman went, as directed, and found the child in the state described, and immediately sent for medical assistance, but life was extinct. The policeman stated that the conduct of the prisoner, when she came to the station, was perfectly calm and composed, and that she maintained the same demeanour when before the coroner, and she spoke of what she had done as if it had been some matter of ordinary occurrence. The witness, Mary Shepherd, who saw the prisoner enter her house with the child, said she had known her for thirty years, and had always found her to be excessively fond of her children, and particularly of the one whose death was now in question, and that when she took the child in her arms she kissed her again and again, and then went into the house. She also said the prisoner was subject to epileptic fits, and she always considered her to be a person of very strange and eccentric habits. She was of a very religious turn

of mind, and was in the habit of walking about the streets with a hymn-book, and singing hymns in a strange manner, and doing various other eccentric acts, which caused her to be called in the neighbourhood "Flighty Mrs. Oliver." She also stated that the prisoner's husband had treated her very badly for many years, and she had often seen her with bruises and black eyes. When before the coroner the prisoner made the following statement:—"I done it, sir; I am guilty, entirely through my husband's ill-conduct to me for the last sixteen years. I had three children born diseased, and one he killed before it was born. The reason I did it was because I was weary of my life, and had sooner die than live." The surgeon who had seen her in prison said, from what he saw of her, he could not say she was of unsound mind, but he thought a person who was liable to epileptic fits was likely to become insane, and sometimes that change would take place rapidly.

Acquitted, on the ground of insanity.

MURDER.—NORTHERN CIRCUIT, YORK.—Before Mr. Baron WILDE.—John Holdsworth, aged 37, was indicted for the wilful murder of Elizabeth Holdsworth, his wife, at Kildwick, on the 10th of June last.

The prisoner, it appeared, was the keeper of a toll-bar. He was a man of frugal habits, had accumulated from 100*l.* to 200*l.*, and certain family differences had arisen from his indisposition to aid his relations with money. On the 8th of June the prisoner's daughter went for her mother's brother, Joseph Snowden, by her mother's request, as her father, the prisoner, was unwell, and they were uneasy about him. The brother of the deceased went to the prisoner's house on Saturday, the 8th of June, and slept there that night. He heard the prisoner at six o'clock next morning call his wife up and ask her, "Lass, where's that brass?" The prisoner was also heard in the course of that day quarrelling with his wife about the bank-book which she had in her custody, and which he wanted from her. The prisoner went that night to the house of his father at Aden, and slept there, returning next morning, Monday, the 10th of June. On his return he found his wife and brother-in-law in care of the bar, and seemed annoyed at this, handing his hat to his brother-in-law, Joseph Snowden, and telling him he could do without him, he had better go. At about half-past five that afternoon, a cattle drover having passed through the gate, the deceased went out and had some dispute about the toll to be paid with the drover for cattle which had passed through the bar the day before. The brother of the deceased went out to his sister, and the drover shouted to the prisoner, and asked what he said about it. The prisoner said he could say nothing between them, as he was from home that day. The drover passed on, and whether made angry or not by the interference of his brother-in-law in the matter did not appear, but the prisoner immediately barred the half door of the toll-house, leaving his wife and Snowden outside, and handed to Snowden his hat over the half door, and told him to go. Snowden took his hat, and then told his sister, as she was going to leave her husband, she had better go away then with him. He induced his sister to go with him about 100 yards from the toll-bar on the Steeton-road, when he heard the prisoner shout from the toll-house, "Come back, lass, and let him go." The deceased then wanted to turn back, as she said he would be burning her clothes if she did not, and he returned with his sister to within 35 yards of the tollgate, when he saw a flash and heard the report of a gun, and immediately his hat was knocked off, and he saw blood on his waistcoat, and he turned and ran away. At the time he did not see his sister, but when he thought he had got out of danger he stopped, and saw his sister laid across the footpath. He ran to a house near Steeton and told a policeman. The prisoner had a double-barrelled gun hung up in his house, which witness understood was loaded. He found himself wounded in six places on the face and body. Immediately before this occurred

a young gentleman named Garforth rode on a pony through the bar, and saw the prisoner in the doorway smoking a pipe, and spoke to him, saying it was a fine day. The prisoner answered, "Yes." Garforth then rode on to the house of a man named Spiers, about 150 yards off, from which the toll-bar could be seen, and there he saw the prisoner look up and down the road as Mrs. Holdsworth and Snowden were walking towards the bar, and immediately after he heard the report of a gun and saw Mrs. Holdsworth stagger and fall on the footpath, and Snowden run away. His pony galloped off with him, and he gave an alarm to a policeman whom he overtook at some distance from the bar. The prisoner was then seen to walk quickly across the road and climb over a wall, and walk quickly across the country to Aden, where he was immediately followed by the policeman and taken into custody in his father's house at Aden, and charged with the wilful murder of his wife. The prisoner said, "Yes; I've shot her;" and pointing to a beam in the house said, "hang me where I am."

When before the magistrates he made a voluntary statement—"I cannot say that I can say so much about it, for I have been fearful bad in my head. I don't know whether the gun was upstairs or down. I can remember having it in my hand when it went off, but I did not see them either inside or out. As for disturbances we have had a great deal of it lately. I cannot see what I have to leave there for, and her have plenty of money, and her and her brother about that place. They regular kept me wrong at times, like wanting me away, and I cannot see why they should. I have got nothing else to say. The way they have gone on for many a week—they wanted to turn me away without a halfpenny."

For the defence it was elicited on cross-examination of the witness Snowden, and it appeared from the learned counsel's opening for the defence and from the evidence of the prisoner's daughter, that the state of the prisoner's mind had excited the grave apprehension of his family, and had led to an arrangement being in progress for his giving up the toll-bar and going to his father's, and for the deceased to leave him and go to her relatives, as she was afraid to live with him. From infancy he had been subject to pains in his head. He was sullen, sleepless, and incessantly talked at night. Sometimes he was unable to recognise his best friends. He took irrational aversion to his wife's clothes, and to a black silk dress she had, which he called "a serpent." He was suspicious, and thought people were attempting his life, and fancied he saw wizards and devils about a Catholic priest's head. It had been frequently suggested that he should be taken to an asylum, but his wife was unwilling, and thought they could not afford the expense. There was also insanity in his family, which he might have inherited. It was elicited from his brother-in-law Snowden that he had been sent for twice because of the state of the prisoner's mind—once in May last, and two days before this event happened; that the prisoner's daughter had come for him because "her father had been carrying on very badly the night before, and they dared not stay any longer with him." He had burnt different things that night, and in consequence witness went to the bar-house on the 8th of June, to take care of his sister and niece and watch him. He went to see his brother next day, as the prisoner was rather better, and that night they persuaded the prisoner to go to his father's at Aden. About six weeks before this event the prisoner was very bad in his head, and went on so queerly he was sent to his wife's father's. While getting his breakfast the morning after he went, he said there was "something in the tea not right," and he jumped up and left the house and would not return, and his wife's father went after him, afraid that he would do himself some injury. On Sunday, the 9th of June, while the witness Snowden was at the bar-house, the prisoner took a religious tract from his hand, and read it aloud, crying. From the evidence of the prisoner's daughter it appeared that about the 1st of May the prisoner was very low-spirited, and thought everybody was trying to do him all the

harm they could. He began to read his Bible, and to talk of the Catholics, and said he did not know whether he would join them, or the Ranters, or Methodists. He had never before attended a place of worship. He said he thought some copper money he had received from Catholics, and would not have it, but threw it across the road when it was dark. One morning he got up to take toll for a gig, and said he could not see the gig for a mist before his eyes. He thought Catholics were in the gig, and would not have the money they paid for toll, but gave it to his wife. The week after a horse galloped through the bar, and the prisoner came running downstairs, and strove to hide himself in the cellar, and she and her mother pulled him back. He then became quiet, and wished her and her mother to go out, and he would shoot himself. They sent for her uncle Thomas, and at night her father stood up in bed, and peeped through the curtains, and said her uncle wanted to hang him. He got better, but on the night of the 7th of June he kept "calling" her mother all night, telling her she was always trying to do her worst to him, and behaving badly to him. He said he thought children ran about him as they never used to do, and that the cat looked pitifully at him. He got her mother's clothes out of a drawer and attempted to burn them that night, and also a mahogany box with thread in it. In consequence, her mother wished a neighbour named Parish to come in and stay; he could not, and her mother then sent her to fetch her uncle Joseph Snowden. Her uncle next day, at her mother's request, wrote to the manager of the tolls to send another man to the gate, as her father was not fit to have the care of the gate. Her mother told him she had sent the letter, and he said then he would not leave. He had agreed before it would be better to go. He looked troubled, and cried when he read the tract on Sunday. She had hid the gun when her father was ill in May, as she thought he was not in a fit state to have it; but he had afterwards asked for it.

At the close of this witness's evidence,

His LORDSHIP asked the learned counsel for the prosecution whether, after this evidence (which appeared to be *bonâ fide* as to steps taken by the prisoner's family before the deceased had been shot, and therefore not open to suspicion, to have him taken care of, because of his reason being disordered), a conviction could be expected.

The Counsel said, if that was his Lordship's impression, he would gladly leave the case in his hands.

His LORDSHIP then asked the jury their opinion.

The foreman said they were unanimously of opinion that the prisoner was *Not Guilty*, on the ground of insanity.

The prisoner was then told that he would be confined during her Majesty's pleasure, and was removed from the dock.

MURDER (CHILD).—MIDLAND CIRCUIT.—LINCOLN.—BEFORE MR. JUSTICE WILLES.—Ann Wilson, aged 37, pleaded "Not Guilty" to an indictment charging her with the wilful murder of Lucy Wilson, at Haxey, on the 9th of July last.

There were two other indictments against the prisoner, severally charging her with the murders of William and Elizabeth Wilson, which ultimately were not proceeded with, the facts of all the cases being the same.

On the morning of the 8th of July the prisoner's husband having gone to Worksop, intending to return on the 9th, the prisoner, whom he had left at home with her three children, went to the house of a near neighbour named Webster and inquired whether his little boy would take her next morning to Wheatley, the village where her father and brother lived, and where it had been arranged that her husband should call for her on his return from Worksop. Webster's wife went the same evening to talk the matter over with the prisoner, and saw the children all looking well and happy, the youngest of them sitting

on the mother's knee. On the following morning Webster, in fetching the pony, twice passed the prisoner's house as early as between five and six A.M., and noticed that the windows were closed and the blinds down as if all were snug in bed. He went at six A.M. to the house and saw the prisoner alone washing herself at a sink, and inquired at what time she would be ready. She replied, whenever he was, and Webster accordingly got the pony ready, and sent his wife to inform the prisoner, who very shortly came, and was taken by the boy to Wheatley. On reaching Wheatley she was met by her brother, Joseph Parr, who inquired where she had left the children. She said she had taken care of them. He asked if she had left the nurse with them, and she answered "No." Soon afterwards he heard a cry of distress; it was from the prisoner's husband, who had met his wife and had been talking with her. He said, "She says she has put the children in the cistern." Her brother asked her if she had, and she said, "They are in Heaven!" He inquired how she did it. She told him that she fetched the youngest first, and kissed her all the way downstairs, and then fetched William and then Elizabeth. She told her father not to cry, saying that she had not done it on purpose. She wished she had them back, and asked whether they could not be brought to life again. Elizabeth, she said, cried out for help, and she (the prisoner) took up the mop to help her and pulled her up, but pulled the mop out of her hand and she splashed down again. She had always been kind and affectionate to the children, and had lived on affectionate terms with her father and brother, but latterly she had become so absent that she did not speak when addressed. On going home her story was found to be true. Her husband, in company with Webster, went to the house and found the bodies of all three children in a brick cistern, with two feet of water in it, that of Lucy being lowest. Nothing unusual had been noticed in the prisoner that morning, but it appeared that she had been confined in the previous December, and had since been very ill. Her weakness both of mind and body attracted the attention of her friends and neighbours, and by their advice she was visited by Dr. Pritchard, of Retford, who found her suffering from lowness of spirits, lost of appetite, sleeplessness, and pain in the head. He was satisfied that she was of unsound mind. Several of the witnesses for the prosecution had remarked that she was oppressed by a religious despondency and absence of mind, so that she appeared unconscious of what she was doing. She had at times a wild look, and wished that her boy was in Heaven, as he would be better done for there than she could do for him, and she should be sorry for him to grow up a fighter or a drunkard.

The learned JUDGE, addressing the jury after the evidence of Dr. Pritchard, said he did not think they could desire the case to proceed further. They must be satisfied that the prisoner was not in a sound state of mind when she did the act which was charged as murder, and believed that she was acting under a command of God higher than the law.

The jury immediately returned a verdict of *Not Guilty*.

Lack of space prevents us recording four remarkable, we might say, anomalous, cases of murder, occurring or reported in the judicial proceedings of the quarter; but we shall return to this subject and to the consideration of these cases in a subsequent number.

The following cases are worthy of being noted, as appearing in the police reports, the civil courts, and the daily press of the past three months, and further exemplifying the ills apt to arise from neglected or unrecognised lunacy.

1. A serious case of indecent assault committed by a solicitor (a

married man with a numerous family), in Battersea Park, while suffering under grandiose delirium and erotic excitement, doubtless precursors of general paralysis. On the morning after his arrest, this gentleman said to one of the witnesses, "Traer, I am going to give you 1000*l.* tomorrow; Philip, 1000*l.*; and the colonel, 10,000*l.*; for I have just married a woman with 60,000*l.* a year, and we have got six carriages, and are going all over the world. I have got lots of wives—in fact, a perfect harem."

2. A case of pilfering by a young lady—a semi-imbecile. This case should never have come into a police-court. It is unjustifiable, or at the best, cruelly thoughtless, that tradesmen should place persons in a position similar to that of the accused under summary arrest, without previous inquiry.

3. A case of a well-to-do, if not wealthy, lady spending her time by driving about the streets in cabs, and then refusing to pay the owners; thus compelling them to summons her before the magistrates. She makes no answer to the charges, but simply pays the money and costs.

4. A curious case of libel, tried before Mr. Justice WILLES, at Lincoln, and of which the following is a report:—

The plaintiff is a clergyman, the incumbent of the Chapel of Langrich and Thornton. The defendant is a hawker of tea and of tracts, a teacher and a preacher, and as the learned counsel stated in his opening address, orderly, industrious, and respectable, with the exception of the uttering and publishing the slanders in question, which seemed to be founded on some strange delusion, as he must term it, although he desired to exercise the utmost forbearance towards the defendant in stating the case. It appeared that the defendant had some time previous to the spring of 1860 gone to various persons in Langrich, stating that a poor Wesleyan dressmaker who lived with her mother, and received 2*s.* 6*d.* for weekly relief from the parish, was in the family-way by the plaintiff. He stated this to the board of guardians, who in consequence discontinued the relief; and subsequently stated that she had actually been delivered of a male child. A surgeon who had attended her on account of weakness under which she was labouring, visited her for the purpose of ascertaining whether it were so, and was satisfied that she neither was in the family way nor ever had been. He met the defendant and told him so. The defendant, however, persisted in it that she had had a male child, and went to the Willertons, where he insisted, to both mother and daughter, that she had been delivered, and that Mr. Simpson was the father. These statements were mentioned to the plaintiff by a parishioner as having been said by a man who was evidently crazed, and of whose words no notice need be taken, but the plaintiff's brother hearing of the matter, wrote to the defendant, asking what he meant by making such statements of his brother. The defendant replied that he did so because they were

true. In consequence of this a meeting was held of the parishioners, at which an unanimous vote was passed reprobating the defendant's conduct. Thereupon the defendant wrote the letter containing the alleged libel, which referred to the same charge, and imputed to the plaintiff that he was not fit to exercise the office of a Minister. The present action was consequently brought, and the plea which the defendant pleaded will sufficiently show with what sort of mind he had uttered these imputations. It was in these words:—

“The defendant in his own proper person for a plea to the whole declaration, says he is firmly convinced that it has been revealed to him by the Lord that the charges made against the plaintiff, as in the declaration alleged, are all true, and that the defendant spoke and wrote under the influence of that conviction, and not from malice.”

This plea was withdrawn on a suggestion by the Lord Chief Justice COCKBURN that it was not issuable, and a plea of *Not Guilty* and of the truth of the libel entered.

The evidence of the plaintiff, of Charlotte Willerton, of the mother, and of the surgeon entirely and completely negatived any improper connexion and the fact that Willerton had ever had a child.

The defendant was over and over again reminded by the learned judge of the groundlessness of the charges, and desired to consider whether he would not, before the verdict, retract his statements and apologize. He seemed to labour still under a hallucination, and said he could not, although he declined to address the jury or call any witnesses.

The jury found a verdict for the plaintiff, with 100*l.* damages.



THE

MEDICAL CRITIC

AND

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JANUARY, 1861.

ART. I.—THE MARVELLOUS.*

IN the last number of the past series of this Journal we briefly reviewed the chief “phenomenal phases,” as the Spiritualists say, under which the love of mankind for the marvellous has been displayed in past centuries. We purpose in the present article to consider the manifestations displayed in our own time; and it will not be amiss, in the first place, to recapitulate the actual claims of the Spiritualists, as stated by a prominent brother of the order, who is wishful to “present a brief general statement of the leading phenomenal phases in which, at the present day, Spiritualism is presented to us.”

“Before doing so,” writes this author (*Spiritual Magazine*, No. 2), “as a preliminary observation necessary to a right understanding of the matter, we would remark, that there are persons in some way peculiarly constituted whose presence appears to furnish conditions requisite to enable spirits to act upon matter, or to manifest their agency in any way cognizable to men. In what this peculiarity consists, whether it be chemical, electrical, magnetic, odyllic, or in some combination of these, or in what else, it would lead us too far from our present purpose to consider.” (We break into the quotation at this point, in order to call attention to the effects of spiritual intercourse upon English composition.) “At present we would only point out the fact that the presence of one such person at least is necessary in

* *Histoire du Merveilleux dans les Temps Modernes.* Par Louis Figuier. Paris, 1860.

The Spiritual Magazine. London, 1860.

The Arcana of Christianity, and various Sermons. By the Rev. T. L. Harris.

every circle before any spiritual manifestations can be obtained. Such persons are now technically designated *mediums*."

The most common form of the manifestations, and that which is most easily obtained, is seen in—

"1. *The Rappings, Table-tippings, and other Sounds and Movements of Ponderable Bodies*.—The company assembled place their hands lightly on a table, and if a suitable medium is present, in a short time sounds, like raps or detonations, are heard on the table, the chairs, the walls, or the floor, often varying in power and tone. . . . At other times, instead of sounds being heard, extraordinary movements of the table are seen, it rising and falling vertically or perpendicularly, and to different elevations off the floor, or sliding along the room first in one direction and then in another, or moving rapidly round it. . . . On more than one occasion we have seen the table rise from the floor without any contact . . . no one being nearer than from two to three feet of it. Human beings also have frequently been raised off the floor and floated round the room in the presence of numerous persons.

"2. *Spirit-writings and Spirit-drawings*.—The former of these modes of communication is not unfrequent. Usually, the medium holds a pencil in hand as for writing, and, sometimes immediately, sometimes after a few minutes, the hand goes into involuntary motion, forming letters, words, and sentences, making an intelligible communication or reply to some question, verbal or mental, that has been asked. . . . With some mediums the hand is simply used mechanically, the medium not having the slightest idea of what is being written; with others this is accompanied by impression as to the immediate word or sentence that is to be written, but no further. I know one medium who sees before him in the air, or upon the table, the word he has to write. . . . Cases of direct spirit-writing, that is, not requiring the intervention of a mortal hand, are comparatively rare.

"3. *Trance and Trance-speaking*. . . .—In this state the trancee frequently speaks as from a spirit—sometimes in long and sustained discourse; and even at times in a foreign and (to the trancee) unknown tongue. We have scores of times heard persons of but little education discourse, when in this state, with an amplitude of knowledge which we are sure they did not in themselves possess, and with a logical coherence and power of expression of which in their normal state they were incapable. . . . This state is similar, if not identical, with that which in the same persons may be induced by mesmerism.

"4. *Clairvoyance and Clairaudience*. . . .

"5. *Luminous Phenomena* are sometimes seen at spiritual *séances*. They are usually described as very brilliant; sometimes they appear as stars, or as balls of fire; at other times they shoot, meteor-like, through the apartment, or gleam over the walls, or appear as luminous currents circling round a particular centre, such as the hand of the medium, the pencil with which he is writing, or some object in the room.

"6. *Spiritual Impersonation*, or the representation or reproduction in

a medium of the actions and manner, gait, deportment, and other peculiarities which distinguished the actuating spirit in his earth-life.

"7. *Spirit-music*.—A musical instrument, say a harp or an accordion, being held or suspended in the hand of the medium, or of some person near him, tunes are sometimes played on it by invisible agency, often in a very superior manner; sometimes it will be a known and familiar tune, at other times spirit-music will be thus improvised.

"We know persons who often, when alone and unexpectedly, hear delightful music, apparently in the air, resembling, and yet unlike, any other they have heard. . . .

"8. *Visible and Tactual Manifestations*, such as the appearance and touch of *spirit hands*.

"9. *Spirit Intercourse by means of the mirror, crystal, and vessel of water*. . . .

"10. *Apparitions of the Departed*. . . .

"11. *Visions and Pre-visions*.

"12. *Dreams*. . . .

"13. *Presentiments*. . . .

"14. *Spirit Influx*, by which ideas and sentiments are infused into the mind. . . .

"15. *Involuntary Utterance*,

"16. *Possession*.—We believe that many persons treated as insane are only so in the same sense as the demoniacs of old." . . .

These quotations afford a sufficient basis of information concerning the alleged facts of spiritualism to enable us to investigate its nature and causes, and we now proceed to consider the whole matter under two heads—first, the physical phenomena of a *séance*; and, secondly, the results of spiritual dictation.

It has been conceded by the Spiritualists, over and over again, that the marvels of the *séance* are of the same nature with those wrought under the names of witchcraft, demoniac possession, mesmerism, &c.; and it follows that the facts and arguments bearing upon the latter will apply to the former also. With this preliminary statement, it is necessary first to take into account the element of fraud that enters into such pretended miracles.

In the accounts of *séances* that are held in private houses, we are usually assured that no fraud has taken place; and the character of the host is frequently adduced as a guarantee for the good faith of the performance. We must, however, take into account that all the tricks of a *séance* could be readily accomplished or surpassed by any of the intelligent gentlemen whose vocation it is to exhibit sleight of hand before the public; and hence, where deception is not only possible, but easy, we want some better security against its occurrence than can be furnished by the presumed integrity of the proprietors of drawing-rooms. *Quis custodiet ipsos custodes?* There have been some very great

rogues whose honesty would have been thought above suspicion, until the day when their knavery was detected ; there are many owners of ottomans and accordions whom it would not be difficult to dupe ; and there are even some individuals not wholly lost to a sense of the pleasures of hoaxing. Upon all these grounds, it is fair to require that every display of spirit influence should bear the test of a close and critical examination—and that even the tables of an entertainer should not be exempted from suspicion and from search. In order to show some of the methods of deception that were practised during the prevalence of mesmerism, we proceed to condense a few pages from the work of M. Morin, entitled, *Du Magnetisme et des Sciences Occultes*.

“About twenty years ago (M. Morin, states) the famous Robert Houdin exhibited a new trick, of his own invention, which he called *the second sight*. It was performed as follows :

“A lad of twelve, being placed at one end of the exhibiting saloon, Houdin, crossing to the other side, requested the spectators to bring to him any objects they might have in their possession. He then questioned the lad about these objects ; and received exact descriptions of them, without any hesitation or mistake. The following may serve as a specimen of the dialogue. “What do I hold *with* my hand ?” “A piece of money.” “Of what value ?” “Five francs.” “Of whose reign ?” “Louis Philippe’s.” “Of what year ?” “1831.” “What do I hold *in* my hand ?” “A box.” “For what purpose ?” “A snuff-box.” “Of what material ?” “Gold.” “What is there on the lid ?” “A portrait”—and so on. The rivals of Houdin, forced to study his trick, at length discovered and imitated it, until at all the fairs the acrobats joined this second sight to their tumbling, and sometimes, in order to add the attraction of mystery to their performances, pretended to mesmerise the person who described the objects. The secret was eventually published, under the name of *anti-magnetism*. It consists in this, that the manner of putting the question conveys the answer. For instance, they would ask, “What do I hold with my hand ?” “What do I hold in my hand ?” “What is it that I have in my hand ?” “What is it that I hold ?” &c. By varying the form of question it is easy to establish a conventional language ; such that the first form shall signify a piece of money, the second a watch, the third a ring, and so on. As the spectators only presented things that they were accustomed to carry, a very large number of forms of question was not required ; and little dictionaries were published, by which, and by the aid of memory, any two confederates could reproduce the trick of second sight. M. Gaudon, among others, in a *brochure* entitled, *The Second Sight Unveiled*, explains in detail many ingenious strata-

gems ; and pleasantly relates that he practised some of them in the presence of a party of mesmerists, declaring throughout that the performance was but a trick. The mesmerists, however, maintained that his confederate was a clairvoyant ; and himself a magnetiser of the first order ; and would not believe otherwise until they were shown the exact method of procedure.

“ It is now well known that this second sight is but an exercise of ingenuity which does not require any unusual powers, and, notwithstanding the *séances*, somnambulism is nothing else. Whenever the magnetiser knows what the somnambulist ought to do or to say, he is able to prompt him in a conventional language, expressed either by words apparently insignificant, or by a pressure of the hand, or some other method of touch, or even by his manner of walking, or of approaching a seat. You write on a morsel of paper something that you wish to have done by the somnambulist ; you give this paper to the magnetiser, who reads it, and who, without saying a word, places it in the hand of the subject. Presently what you have written is executed, and then the paper is shown to the applauding audience. It is but a trick. A touch of the hand has sufficed to indicate the part of the somnambulist. One magnetiser who became fashionable in Paris confessed to one of the most honourable members of the Philanthropico-magnetic Society, that he had 180 distinct methods of touching his subject ; and that these were all signs, previously agreed upon, by which to make the subject do those things which the audiences were most accustomed to require. Being reproached for his bad faith, he replied that the magnetic lucidity was so variable, as often to require the assistance of other means.

“ Certain magnetisers have devised means of communicating with their subjects, without the aid either of words or of contact. We will cite two examples. A juggler who exhibited the trick of second sight, exhibited also the transmission of sensations. The pretended somnambulist held a glass of water ; and the performer announced that in drinking it she should experience the taste of any beverage selected by the audience. The name of the beverage required being written upon paper, the operator, commanding perfect silence, placed himself behind his subject, and out of her sight, neither touching her, nor uttering a word, but making mesmeric passes with extended arms. While thus employed he panted violently, as if exerting an energetic effort of the will. The somnambulist drank ; and after a few seconds declared that she had tasted whatever liquid had been specified upon the paper. In this case the loud and varied breathing of the operator was the language which served to indicate the beverage that should be named.

“ A friend introduced to me a subject said to be endowed with a

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most rare faculty. This individual having withdrawn, a card was taken at hazard from a pack, and presented to the operator, who, first looking at it, placed it face downwards upon a sheet of white paper, and made believe to mesmerise it. By this process, he said, it left upon the paper an impress visible to the somnambulist. The card being removed, the operator seated himself on a chair, silent, immovable, and even with closed eyes, so as to remove all possibility of collusion. Then, as previously arranged, the subject was brought into the room, and having examined and smelt the paper, he announced, first the colour of the card, and then the card itself. The operator, after receiving our tribute of applause, informed us that the performance was a trick, requiring neither mesmerism nor clairvoyance. The position of his legs with regard to those of his chair, and of his arms and hands, formed a language sufficiently copious to designate all the cards, and enabled the pretended subject to see, at a single glance, which one had been taken from the pack.

“It may be safely concluded, therefore, that in all cases where the magnetiser knows what is required from the somnambulist, and remains in the room with him, the performance is open to suspicion. Such exhibitions prove nothing; inasmuch as it is impossible to exclude from them opportunities of deception.

“It is also necessary to regard with caution all performances of which the programme has been laid down beforehand, because such may be pre-arranged between the mesmeriser and the subject, who then has only to go through the steps of his part in their order. At one period of the *soirée* he will be insensible, next cataleptic, then ecstatic, and so on. In such cases, to require a variation of the programme will often break down the whole performance. For example, at a *séance* at Vauxhall, there were two brothers; one magnetiser, and the other subject. The former went through a succession of experiments in his own order, and prefaced each one by a statement of what was about to be done; but he was generally at a considerable distance from his subject—and out of his hearing—which seemed a sufficient security for good faith. At length he announced that he would draw his brother to himself from one end of the stage to the other; and the better to display the force of the magnetic attraction, he invited four strong men from the audience to form a barrier between himself and the subject, and to endeavour to arrest his passage. The four men took their places before the subject, whose eyes were bound, and who appeared to see nothing, although this had not been ascertained with proper care. The audience awaited with impatience the signal for bringing the attractive force into play. At this moment I advanced with an air of mystery to the magnetiser, took him by the hand, and

drew him away from the position in which he had placed himself, inviting him to exercise his attractive force from his new station. We were so placed that the subject could reach us, in a direct line, without coming into contact with the four men. The magnetiser was evidently opposed to my proposition, but having announced that he had power to attract his subject at pleasure, he could not refuse to try an experiment more easy than that which he had announced; the distance being less, and there being no obstacles in the way. He set himself to magnetise with great energy, blowing like a porpoise, and probably expecting that the subject, hearing his breath, would be warned of his changê of place; but, unfortunately for him, the noise of the audience drowned that of his breathing. The subject, thinking all prepared, started as if nothing had been changed. Using his fists vigorously, he soon dispersed the four men, and continued his course in a direct line to the place where he expected to find the magnetiser—and then stopped, resting as one who had fulfilled his task, and not appearing to care the least in the world to seek for him who was said to be his centre of attraction. He had not felt, therefore, the force said to be directed towards him, and had yielded to an imaginary attraction; or rather, there had been neither attraction nor magnetism in the case, but simply a concerted programme between two individuals, of such easy tricks that no juggler would venture to exhibit them, although the public regarded them with wonder when presented under the name of mesmerism. The experiment of attraction had been accepted and admired for many nights; and yet one single precaution was sufficient to reduce it to its real value.

“In many exhibitions of clairvoyance, the eyes of the somnambulist are bandaged, and it is said that he can derive no aid from them. Those who have observed such exhibitions carefully, will not be slow to perceive the insufficiency of this precaution. If the somnambulist can name correctly and immediately the objects presented to him, it may be concluded that he can see them. But this is seldom the case. Usually he takes the object in his hands, feels it, and endeavours to form an idea of it by the aid of touch; then conveys it to his forehead and his nostrils—complains of fatigue, and requires the intervention of the magnetiser to give him a fresh dose of fluid. During these preliminaries, if the magnetiser himself can see the object in question, it is clear that the experiment must go for nothing, because by a word, a gesture, or by some of the contrivances described above, he has the means of conveying information to his subject. But suppose that, not attempting to conceal suspicion of the mesmeriser, such precautions are taken as to prevent him from either seeing the object or conveying information, then the somnambulist, by dint of grimaces

and contortions, may displace the bandage, and by holding the object in a certain direction, as on his chest, may get such a glimpse of it that, in the case of a writing, he may decipher one or two words. This result, which many persons think wonderful, is altogether ridiculous.

“I was assured that a very famous somnambulist could read through many sheets of paper; and I made one trial of his powers. His eyes were not bandaged, and were not even completely closed. I gave him a book which chanced to be at hand, and which was probably unknown to him. He asked me through how many pages he should read, and I answered, “Twenty.” He opened the book at hazard, and applied it to his forehead with many contortions, then took a pencil, and wrote a line upon the book, saying that it would be found twenty pages further on. The leaves were turned, and the line found, not after twenty pages, but after ten, at a place corresponding to that on which he had written. Was this clairvoyance? It is possible,—and yet it may be doubted: the somnambulist, in placing the book upon his forehead, had an opportunity of glancing rapidly at a line somewhere, and in order to be certain that he had not read in the ordinary manner, he should have been prevented from touching the book.

“In order to give proof of clairvoyance, or of a power of seeing through opaque bodies, it would be easy to take precautions that would leave nothing to be desired. For example, instead of a bandage, use a metallic mask, or even free the somnambulist altogether from such fatiguing restraints, and interpose sheets of paper between himself and the object—or close his eyes with the fingers, and place the object above his eyebrows. But when it has been proposed to Mdlle. Pigeaire, and to other somnambulists vaunted for their clairvoyance, to submit to these precautions, they have uniformly refused to do so, and have only consented to perform under such conditions that trickery, being possible, was to be suspected.

“During a *séance*, there are very few people who can control themselves sufficiently to listen in silence. Most frequently, the audience will talk with the somnambulist, will rectify errors as they are committed, and will approve correct answers; all of them proceedings that must facilitate the task. Often the manner in which a question is put is sufficient to suggest the response. Finally, the audience are astonished by a performance to which these aids have been afforded; they forget the inaccuracies and mistakes, and remember only what has been rightly said, without reflecting that they have themselves supplied the little truth that they have heard. Any person whatever, not clairvoyant, but guessing—having errors constantly corrected, and having ingenuity to frame fresh answers, could not fail to be right sometimes; and

could officiate at consultations precisely similar to the bulk of those that are held daily by the somnambulists.

“Whoever wishes to be certain that the responses, as they should do, emanate entirely from the somnambulist and are not suggested piecemeal, should carefully refrain from any remark or observation. But the somnambulists do not like the persons who proceed thus. They say that such audiences set them at defiance, freeze and take away their powers. And they say truly; for, as most of them are not at all clairvoyant, and only accomplish tricks of address by making people chatter, if the audience remain silent, the performers can no longer play their little parts.”

This lengthy citation from M. Morin, while it cannot be regarded as conclusive against the pretensions of all mesmerists, is sufficient to establish that fraudulent practices were the rule, rather than the exception, in the public exhibitions of their art. It will be in the recollection of our readers that Sir J. Forbes instituted a searching examination into the performances of every professing clairvoyant who came before the London public; and that in every single case, without exception, he either detected and exposed trickery, or else produced complete failure by the employment of precautions that rendered trickery impossible. It is well known also, that a bank-note of large amount remained, for a considerable time, as a prize for any clairvoyant who could decipher its number through two or three thicknesses of paper: a feat much more easy than many of those which they professed to accomplish daily. We believe that no attempt was ever made to obtain the note in question—and, at all events, no such attempt was successful.

From these facts we infer that, as all the physical phenomena of so-called spiritual intercourse could be produced with great facility by simple mechanical contrivances, it is reasonable to suppose that they are so produced in the majority of instances. Mr. E. Delaware Lewis, in a recent number of *Once a Week*, describes a spiritualist *séance* at which he was present, and speaks of the contrivances by which the effects were produced as being too transparently fraudulent to impose upon any but the most credulous of mankind. That the desire to believe and to wonder does very seriously affect the faculties of observation and judgment in many cases, is a truth too familiar to be called in question; and it has lately received a remarkable illustration in a paper called *Stranger than Fiction*; the strangest thing about which was, that it found admission into a publication so respectable as the *Cornhill Magazine*. The writer, supposing him to write in good faith, has so jumbled together possible occurrences with opinions and with accounts of his own emotional state, that no judgment whatever can be based upon the resulting medley.

Offering himself to the public as a narrator of events which he admits to be scarcely credible, he yet exhibits in every line of his composition the most absolute ignorance of the ordinary sources of self-deception. He relates, for instance, that Mr. Home, the medium, went *floating about in a darkened room*; and that the audience could “judge by his voice of the altitude and distance he had attained.” It is humiliating to think that any one, in a position to be described as a personal friend by Mr. Thackeray, can have composed such rigmarole as this, or can be ignorant that a modulation of the voice, sufficient to produce erroneous impressions with regard to the altitude and distance of the speaker, is the easiest of all possible performances. On the face of the record there is not a tittle of evidence that Mr. Home floated about the room at all; and the facts appear to be that a dark outline, resembling that of a human figure, was seen to cross and recross between the spectators and the window, that something, stated to be a foot, touched somebody’s chair, and that Mr. Home carried on a conversation, in the course of which the tones of his voice varied from time to time. The writer does not appear to have a suspicion that these events are a sorry foundation for the very splendid hypothesis that has been raised upon them.

It is curious, but in the *Spiritual Magazine* for June, 1860, there is an account of two evenings with Mr. Home; and the tricks recorded are in all essentials identical with those described in the *Cornhill Magazine*. The narrative given in the latter, however, is much more highly coloured than that in the former; and a comparison between them leads irresistibly to one of two conclusions. Either Mr. Home’s range of performance is limited, and the pursuits of his familiar spirits are remarkably monotonous, or else the two narratives refer to the same events. In the latter case, Mr. Thackeray’s friend of twenty-five years’ standing has drawn the long bow, for the edification of the general public, with a vigour and success altogether unapproached by the reporter for the special organ of the Spiritualists themselves.

Taking all the circumstances into account, we do not hesitate to express a very decided opinion that nine-tenths, or a larger proportion, of the physical manifestations of so-called spiritualism are neither more nor less than impudent frauds upon the credulity of the public; and we trust that some competent observer will undertake, with regard to them, researches analogous to those by which Sir John Forbes demolished the pretensions of the mesmerisers. We must fully admit the propriety of Professor Faraday’s refusal to investigate such matters, based, as it was, upon the better occupation of his time; but there are many who might accomplish the task, as an amusement during leisure that

would not, perhaps, be more usefully employed elsewhere. The mechanical and other contrivances in use are probably various, but there is little doubt that any one, possessing a moderate practical acquaintance with the applications of physical and mechanical science in the production of ordinary conjuring tricks, would very soon lay bare the more common methods of procedure ; some of which, indeed, since this paper was written, have been graphically described and illustrated in the pages of *Once a Week*.

In the next place, we may remark that many of the statements made by the Spiritualists cannot possibly be true. We will not discuss the physical impossibility of table-lifting without the employment of adequate force, so long since pointed out by Professor Faraday, but will select, by way of illustration, such a sentence as the following :—

“ We have heard the rappings upon the floor, as if produced by a crutch : in this case, a lady present informed the circle that that was the mode in which the spirit of her grandfather signalled his presence to her. . . . *All present saw exactly the spot whence the noise came, though no crutch or other means of making the sound was visible.*”
—*Sp. Mag.*, No. 2.

Now it is very well known that the human senses are not so organized as to afford means of “ seeing exactly the spot ” whence a sound comes ; nothing being more easy than to be deceived with regard to this very point. An exhibition of ventriloquism is a sufficient proof of this position ; and a reference to the physiology of hearing will of course place the proof upon a scientific basis. Mixed up with a description of the alleged *facts* of spiritual intercourse, we have, therefore, a statement that is necessarily untrue, because it involves an impossibility ; and it is difficult to avoid the supposition that a similar recklessness of assertion may characterize other parts of the same narrative.

Upon many points that would allow the application of tests, the language of spiritualists is too vague for refutation. For instance, they claim for trancee (*Sp. Mag.* No. 2.) a power of speaking about things, and in languages, lying beyond the sphere of their natural knowledge ; and this claim is not sufficiently definite to be scrutinized. It is the most familiar of physiological facts that, in certain conditions of the nervous system, past sensory impressions, that need not have been understood, may be recalled ; and in this way sentences of unknown or of forgotten languages, or scraps from scientific lectures or treatises may be brought back to the memory, and uttered, under the influence of suggestions or associations that would be inoperative in the normal state of the system.* So far as this goes, we may admit the

* The writer once attended a lady who, for two or three days was delirious after childbirth. She had been born in France, had resided there during infancy and

facts alleged by the spiritualists, and deny their conclusions; somnambulism, either natural, hysterical, or artificial, being a sufficient explanation of such occurrences; and the only condition necessary to the so-called miracle being that what is uttered should have been *heard* by the speaker at some former period. If the mediums claim more than this, they must assume one of two positions: either that the spirit communicating speaks with the precise amount of knowledge that it possessed whilst inhabiting an earthly body; or else that the spiritual state involves an increase of knowledge with regard to physical science, and with regard to the deeds done, and the languages spoken, upon the world. Each of these hypotheses would admit of speedy and practical demonstration; and either of them, if found correct, would lead to results eminently advantageous to mankind. If the former alone were true, we should be able to obtain from mediums a vast mass of information concerning past occurrences that are imperfectly recorded or understood. Scholars would rejoice in the restoration of works now known to us only by precious fragments. Historians would terminate for ever their disputes about bygone facts. The departed miser would reveal his hoarded store; and the spirit of the victim would denounce the secret murderer, and point out the collateral evidences of his guilt. If the latter were true, the world would have realized, long before this, consequences which, but to think of, bewilders the imagination. Philosophers, painfully and laboriously seeking after truth, are surrounded, in every department of inquiry, by a dim circle of hypotheses, standing between positive knowledge and the unknown. If, by communication with higher intelligences, they could be freed from the doubts that these hypotheses imply, the progress of the last fifty years, vast as it has been, would speedily sink into comparative insignificance. Bishop South, in his noble sermon upon the character of Adam, uses the known capacities of manhood to illustrate the unknown. "All those arts," he writes, "varieties, and inventions, which vulgar minds gaze at, the ingenious pursue, and all admire, are but the reliques of an intellect defaced with sin and time. We admire it now, only as antiquaries do a piece of old coin, for the stamp it once bore, and not for those vanishing lineaments and disappearing draughts that remain upon it at present. And certainly that must needs have been very glorious, the decays of

early childhood, and spoke the language fluently; but was very slightly acquainted with French literature, and for several years had been away from French people, and from opportunities of French conversation. During her delirium, she sang French cradle songs continually, songs that she could not recal after her recovery. It is obvious that her memory was taken back to the sounds that she had heard in her nursery, and that she had long forgotten.

which are so admirable. He that is comely when old and decrepit, surely was very beautiful when he was young. An Aristotle was but the rubbish of an Adam, and Athens but the rudiments of Paradise." Surely we may pursue this magnificent parallel, and may learn from the vintage yielded by science in our time something of the possible scope of an intercourse that should realize what charlatans profess. We turn from such contemplation to the facts; and we find that modern spiritualism, as it is distinctively called, after six years' existence, has culminated in that brief elevation of Mr. Home, the very reality of which we have seen reason to call in question. Like its prototype of the time of Apollonius and of Simon, like mesmerism, divining rods, and table-turning, spiritualism has been absolutely barren of results. It has not added an iota to the sum of human knowledge, it has not settled a single doubt upon any subject. We judge it by its works—that great test applicable alike to doctrines and to men—and we find it entitled to a place with fifth-rate jugglery or gipsy fortune-telling.

The special forms of "physical manifestations" need not occupy much of our remaining space. Table movements, it is evident, may be produced either by unconscious muscular action during expectant attention, by the knee or foot of the medium or of an accomplice, or by machinery. The sources of the raps and other noises may be infinitely varied at the will of the performer. The appearance of spirit-hands has been greatly elucidated by the cartoons of *Punch*; and their feel by the following curious sentence—taken from the August number of the *Spiritual Magazine*—"the darker part of the room, and here arose a scene of indescribable confusion, but still producing feelings in no way unpleasant, though we knew not, *when we touched each other, who were spirits and who were fleshy human beings.*"!! It is, of course, possible that certain individuals may have spectral illusions—or subjective sensations as of hands; and here again the influence of expectant attention affords a sufficient clue to the phenomena, if such occur. On the same principle, luminous appearances may be explained; but these may be readily produced by most persons, in any dark room, without the intervention of a medium at all. They were made, by Baron Reichenbach, the basis of a perfect avalanche of rubbish about a so called od-force; a very complete examination of which may be found in the *Brit. and Foreign Med.-Chir. Review*, vol. viii. p. 378.

The terms od-force, odyllic sphere, magnetism, magnetic fluid, electric fluid, &c., &c., form part of the machinery by which the spiritualists impose upon the credulity of the public. These terms are used as if they had definite and exact meanings, like water or milk; or as if the magnetic fluid or the electric

fluid could be bought by bottlefuls of a druggist. The frequenters of the *séance* are probably not aware that the term "*fluid*," as applied by philosophers to electricity and magnetism, is nothing but a provisional name, and perhaps an unfortunate one, for agencies, the precise nature of which has not been discovered. There is no certain evidence of the existence of electricity as a distinct entity—as a fluid, and the word is only used as a convenient designation for the unknown cause of certain molecular changes in material bodies. Unfortunately, the public are not aware of this. The existence of the electric and magnetic telegraphs leads many an honest man to believe that, if he knows nothing about their respective "*fluids*" himself, others understand them thoroughly; and he accepts the pseudo-scientific jargon of the day as containing the complete theory of spiritual existence. It cannot be declared too loudly that these words, impudently put forward as the representatives of knowledge, are in reality nothing but the scanty coverings of the most utter ignorance; and that as employed in the *Spiritual Magazine*, and similar publications, they are absolutely without any intelligible meaning whatever.

It is impossible to conclude this part of the subject without some reference to the men by whom the so-called spiritualism is upheld. Leaving hired mediums out of the question, the most prominent names in the *Spiritual Magazine* are those of Dr. Ashburner and William Howitt. Of these gentlemen, the former was unpleasantly conspicuous in connexion with the practice of mesmerism in a metropolitan hospital. Since then, mesmerism has fallen into desuetude by force of utter worthlessness, and its some time champion appears as the apostle of a new delusion. Mr. Howitt is known to us only as having worked industriously for booksellers—a vocation more favourable to the memory and the invention than to the judgment. In their proper spheres, or even in any decorous and modest statement of their opinions, these persons are doubtless worthy of respect. But when Mr. Howitt epitomizes nearly the whole of the human race—namely, all who do not accept his hypotheses concerning spiritualism, under the fanciful appellations of Homo-Sus-Eruditus and Homo-Talpæus, and when both he and Dr. Ashburner raise their pigmy voices in railing against the gigantic intellect of Faraday, they put themselves beyond the courtesies of ordinary criticism. Our indignation at their failure in the respect due to the great philosopher of whom our age and country are so justly proud, must of course be largely tempered by a sense of the overpowering absurdity of the contrast that their assault suggests; but upon such criminals, however contemptible, justice must be done. "What," says Pope, "must be the priest, where the monkey is a god?" What shall we think of a trickery that has Home

and Harris for its oracles—Howitt and Ashburner for the guardians of its shrine?

From the physical phenomena of spiritualism, we may now pass on to an examination of its literature, both descriptive and (professedly) dictated. The *Spiritual Magazine* is the most prominent example of the former, as the writings of Mr. Harris are of the latter.

The *Spiritual Magazine* need not detain us long, and only requires notice in order that we may point out a curious family likeness between the compositions of its various contributors. Through every diversity of style, through various degrees of knowledge, the imbecility of mind necessary to a belief in "spiritualism" makes itself apparent. From the fourth number we quote a portion of an article—italicising certain passages that are especially worthy of remark.

"The Rev. T. L. Harris, in his sermon of the morning of the 19th of February, 1860, said, as far as my memory serves me: 'Every flower, fruit, and tree emits into nature the best portion of its being—its essence. But who has seen the aromal essence of a flower? Who has beheld the essential form thus given off into the universe?'

"This question caused me to remember a curious circumstance which occurred some months ago at the residence of two relatives, neither of them sharing those spiritual beliefs which I hold dearer than my life. I will briefly relate the facts, for there are two. The first is as follows:—

"Another near relative and myself had visited my two lady relatives; and after tea, in the evening, a beautiful night-stock was placed on the table underneath a gas lamp with two burners, one of which only was lighted, with a green shade to throw the light down. As the fragrance of the flower diffused itself through the room, it was remarked by all of us, and I, not being familiar with the plant, was led to examine it more closely. And as I looked there seemed to be a floating mist rising from the flowers of the plant, which I immediately mentioned to my relatives; one of them, the one who accompanied me, and whose hand is used for spiritual communication, looked intently, and after a long time saw the 'smoke,' as we termed it, and then another of the party saw it—one of those who are incredulous on the subjects discussed in this magazine. But the fourth person did not see it.

"I have long noticed, it is here necessary to remark, that when I put my two forefingers nearly together, a spark invariably passes from the extremity of the right forefinger to the corresponding extremity of the left. Nor have my own eyes alone seen this; it has been seen by others, and *I have no doubt that under conditions, and if experiments be instituted on the point, this will be found common to all persons who, like myself, possess sanguine-nervous temperament.*"

The writer proceeds to relate that he approached his left fore-

finger to the stock, and that he immediately “perceived and felt” a flash (electric or odylic) pass to him from the flower. He appears to mean, moreover, that this power of “flashing” was continuous, and not exhausted by exercise; for he says, “The right forefinger produced *similar flashes*, but of less intensity,” and he then breaks out into the following rhapsody—

“I regard this as a matter of science, *although* I do not for one moment doubt that spirit pervades all matter. The question for consideration is. What caused the flash *from* the flowers and leaves? It could not be with force of my own, as I was unprepared for the result; more probably—I throw it out only as an opinion—I had broken in upon the odylic sphere of the flower, which thus reacted upon the electro-odylic battery of my nervo-sanguine system. Cornelius Agrippa (whose three books on Occult Philosophy contain a mass of wonderful speculations upon nature, man, spirit, and God,) suggests the existence, *throughout his work*, of a subtile essence, sympathetic and antipathetic, between all things. *It* is a matter for investigation; and until a series of facts are eliminated by independent observers must remain uncertain.”

It is possible that these pages may fall into the hands of some readers who are unaccustomed to scientific phraseology, and unacquainted with scientific facts. Such a possibility, and such only, will justify a brief commentary upon what is intended to be conveyed by this twaddle about tea and relatives.

In the first place, the sentence from Mr. Harris, the text of the whole affair, is absolute and unmitigated nonsense. If by *essence* be meant *perfume*—it is of course not true that every flower, fruit and tree emits it—because the vast majority are scentless. Neither is it true that this essence is anything invisible or recondite—as implied in the “Who has beheld?” &c.; for it consists—where it exists at all—of an essential oil, well known to chemists, and easily procurable in a separate form. If perfume be not intended, but something else, then that something must be either a definite chemical existence, such as oxygen—about which there is no mystery—or else, a mere figment of Mr. Harris’s diseased imagination. Then what is the meaning of “emits into nature”? What is “nature”? Plants emit their volatile essences into the atmosphere, which is part of “nature” in one sense of the word, just as the plants themselves are parts of it; but Mr. Harris seems to imply that the plant stands outside “nature” and throws something into it. Again, “the best part of a plant.” What is “the best part” of a plant? and how does any one know that the part specified, whatever it may be, is, in any real sense, better than the rest? We apprehend that the only rational application of “best” to part of a plant, would be to the part most useful to man; and that this would be rational

only in a very restricted sense—because the various parts are interdependent, and more or less necessary to each other. But such as our quotation are all the compositions of these would-be mystics, whether they call themselves Spiritualists or not. Words capable of being used in a dozen different senses, and sentences which, when analysed, are seen to be without any particular meaning, make up the sum of the literature of the marvellous—as created by believers.

It is mentioned in all elementary treatises on botany, that the anthers of certain plants are elastic; and in bursting, cast out the pollen, or fructifying dust, in little clouds or puffs. Such an arrangement is chiefly found in erect flowers, having a style higher than their stamens; and it provides for the conveyance of the pollen to the stigma. We have here a sufficient explanation of the “smoke” from the plant, if, indeed, this were anything more than a subjective sensation; and the dry atmosphere of a gas-lighted chamber would be very favourable to the occurrence of the phenomenon in question.

It is obvious that the flash said to have passed between the fingers of the observer, could not have been electric. An electric spark would not be visible against gas light; and no such spark could be obtained in the manner described. An electric spark passes, whenever two bodies, differently charged with electricity, approach each other under favourable conditions. But, if it were possible for the right and left forefingers of an individual to be differently charged, the equilibrium would be restored through the unbroken continuity of the bodily tissues, and not by a spark passing through the atmosphere.

The other hypothesis suggested is, that the flash was “odylic.” Now “odylic light” is a new name for a very old thing; that is to say for sensations, like those produced by light, but dependent upon changes in the sensorium itself, and not upon impressions from actual light falling on the retina. The optic ganglia of the sensorium are so organized as to convey, in their normal state, no impressions but those of light. It follows that almost any change wrought in them, and there may be many such, conveys the idea of light to the mind. Pressure on the eye produces a luminous spectrum. Blows on the head are well known to have the same effect. Expectant attention—*i.e.*, partial hypnotism, produces all sorts of luminous appearances, which, like those from blows or pressure, have no reality outside of the spectator. It is very likely, therefore, that the writer whom we quote may see “flashes” under a great many circumstances, all of them depending upon the state of his own nervous system: but, when he talks of other people seeing the same “flashes,” he falls into the droll mistake of the Irishman, who, having had his head broken on

a dark night, swore that he had recognised his assailant by the light that gleamed from his own eyes on receipt of the blow. It is of course possible that two independent flash seers may meet over the same pair of fingers, or the same flower-pot; but the identity of their flashes, unless pre-arranged, could be disproved by the simple device by which Daniel overthrew the testimony of the elders.

The remaining paragraph that we have transcribed is so utterly without meaning, that it may be useful, perhaps, as a mnemonic exercise. It ought to have been presented to the public for this purpose; as a dictation by the spirit of Foote, and as a continuation of the following:—

“So she went into the garden to cut a cabbage-leaf to make an apple-pie, and while she was there, a great she-bear popped its head into the shop. What! no soap—so he died; and she very imprudently married the barber, and there were present the Joblilies, and the Garuylies, and the Piccalillies, and the great Panjandrum himself, with the little round button at top, and they all fell to playing the game of catch as catch can, till the gunpowder ran out at the heels of their boots.”

In papers of more pretension, in the *Spiritual Magazine*, we observe always the same confusion of thought, and the same obscurity of language. There is a Dr. Blank—professedly, and very possibly, M.D. Cantab.—who undertakes to record FACTS. He says, “I boldly claim for the facts I have here recorded that their evidence has been carefully tested by me and my friend X. Y.” Now there is not the remotest indication of this testing in his descriptions; and we infer that Dr. Blank, like the author of *Stranger than Fiction*, has still to learn that very rudimentary piece of knowledge, the meaning of the word “fact.”

We turn next to Mr. Harris, regretting that the space at our disposal compels us to treat him with a brevity that will accord with his merits, rather than with his pretensions.

The latter are nothing less than Apostolic. Himself a progressed “medium,” and having passed through the physical and intellectual, to the *spiritual plane* of mediumship, he now says that he possesses—and he only—the power of discriminating between good and evil spirits—*e.g.*, between the spirit of Paul the Apostle, and an evil spirit personating that of Paul. With the delicious vagueness of his kind, he thus describes the powers with which he has been endowed:—

“Differenced, as to states, from the men of the present age, by means of an opening of the internal organs of respiration, which is continued into the external form, I inhale, with equal ease and freedom, the atmospheres of either of the three Heavens, and am enabled to be present, without the suspension of the natural degree of consciousness, with the Angelic Societies, whether of the ultimate, the spiritual or

the celestial degree. It is impossible to inhale in this continued manner, from the celestial into the corporeal, without living among the angels. Inhaling the divine aura, by means of which respiration is continued, they exist in a waking reality of Divine Wonders. They enjoy, objectively, the vision of the Lord as a sun, illuminating, with the light of infinite truth, the expanses of the firmament. He manifests Himself in a verbal revelation through the word, which exists in every Heavenly Society. He is also made known to them in a direct appearance, and is transfigured before them in His Divine Human Form. Besides this, He speaks to them by an inmost voice which is audible in the sanctuaries of the breast. All of that tender intimacy which existed, in natural representatives, between our Lord and His disciples, during the period of His incarnation, is realized in His presence with the Angels. Having been finally intromitted into these three degrees of interior respiration, I was led upward, through the series of experiences of which the narration now ensues, that, by a pathway of easy and instructive transitions, I might approach the state of qualification to understand the arcana contained within the Celestial Sense of the Divine Word. At the close of these initiations, as will be found in the context, it was my privilege to behold the Lord, whom I saw in His Divine Appearing, and who laid upon me the charge of receiving and unfolding such of those arcana of the celestial sense as are contained within this volume, and as will in due time be given to mankind in continuance of the labor which is here begun.”*

Into the discussion of such claims as these, we cannot, of course, enter, but must content ourselves with looking at Mr. Harris's writings by the light of internal evidence alone. We are told by Mr. Howitt that the progressive nature of Mr. Harris's inspiration, and his constantly increasing enlightenment, produce changes in his views from time to time; and hence that we must not, in judging of his works, take occasional contradictions into account. Thus he has “*of late* broached the old doctrine of the perdition of certain souls; whereas, in 1855, he was a staunch universalist.” We have more to say about Mr. Harris than the pages at our disposal can receive; and therefore we will leave the question of contradiction as we find it.

The “gifts to mankind” consist, at present, as far as we know, of poems, sermons, and the “Arcana of Christianity.” These must be briefly noticed in their order.

The poems are of various kinds—sacred and profane. The following is the first verse of a hymn “given” by a spirit; and it is followed by three or four more of the same quality. The leading idea is one that no ballad-monger can degrade; but it was revealed to mankind before Mr. Harris's time, and we have only to do with Mr. Harris's treatment of it:—

* *Arcana of Christianity*, Part I. vol. i. p. 7.

"Oft when *storms of pain* are rolling,
And I cross *the fiery sea*,
Comes a voice, my heart consoling,
Jesus loves me,—even me."

With great submission to better judges, we think that the words italicised must have been a "gift" from the spirit of Mr. Robert Montgomery.

The next is a parody on "I dreamt that I dwelt in marble halls." Like the former, it is not original in conception, although strikingly so in treatment:—

"I dreamt that I dwelt in fiery halls,
With a serpent by my side;
She wound me in her venom'd coils,
I had a demon bride.
She spoke with lips like snakes that stung,
And breath of *poisoned* flame,
You ruined me when my heart was young,
But I love you all the same.

My *heart* is now an *adder's lair*,
My *body* turned to *mould*,
I sit alone in dark despair,
Within the devil's fold.
For you I drank the cup of doom,
The harlot's sinful shame.
Come, clasp me in our fiery tomb,
For I love you all the same.

We drank of passion's cup, alas!
And reap what we have sown;
And see in hell's huge looking-glass,
What beauties we have grown.
You are the corpse of manhood now,
In spite of all your fame;
But, foul deceiver, hear my vow,
I love you all the same.

I'll make your heart my *dressing gown*,
And on it I will sit;
And, *like a rat*, your soul I'll drown
In hell's unfathomed pit.
Take back, take back, those fires of lust,
In wreaths of snaky flame,
I spit on thee, thou devil's dust,
But I love you all the same."

We offer these stanzas as a sufficient illustration of the surpassing beauty of "spirit-poetry." They are indebted to the "giver" for nothing but their precise verbiage—the rhythm being a parody, the idea that man's sin shall find him out, not being

new, and the particular application of this idea being expressed, in every detail, by Swedenborg. If any reader wishes to institute a comparison between a "spirit" poem and a "fleshy" one, on the same subject, we recommend Campbell's ballad of the "Spectre Boat," as an illustration of the manner in which similar materials have been handled by an author of taste and genius.

The sermons are somewhat out of our direct line of criticism. They are what many people would call "fine compositions;" and are overloaded with tumid verbosity, and disfigured by such coinages as "*Familism*," and "*Outmostly*," until the actual meaning of the sentences can scarcely be discovered. When found, it is often like the "Emission of Essences" notion that we have already quoted; but, in general, the leading idea seems to be an approaching union of Christians of all denominations on a higher level of faith and duty than that of any single sect; and the means thereto, a general disregard of doctrinal distinctions. We do not ourselves feel that sound doctrine is a thing to be laid aside like an old garment; and we fail to see any evidence that these sermons are not the result of preparation and thought, like the sermons of any other man. They are professedly "mediatorial," which means, in the slang of the spiritualists, that Mr. Harris is but the instrument of their delivery, and that he has no share in their production.

The "*Arcana of Christianity*" might have, as its second title, "*The Spiritual Gulliver*." Purporting to be a commentary on the first chapter of Genesis, it contains an account of Mr. Harris's visits to the Heavens, the Hells, and the planetary bodies—including some of the latter not known to astronomers. It contains, moreover, a particular history of the youth, education, decline, and fall, of the great enemy of souls—upon a planet now destroyed by reason of his crimes, and those of his followers. We cannot enter into any detailed examination of the volume, but must be content with stating general conclusions. Apart from any question of probability, we think the book is not to be received as truth, and for the following reasons:—

In the first place, there is an absence of that verisimilitude, arising from minute touches of description, by means of which the grace of fiction—

"Has power
To render things impossible believed;
And win them, with the credence of an hour,
To be for truths received."

We are told that the inhabitants of the moon are little people, like children of twelve years old, and "breathing from the abdomen;" that the men of Jupiter are of a sky-blue colour, dotted over with gold spangles, and so on; but we never stumble upon

a sentence that conveys, by some little word, or turn of thought, the idea of a recital of actual experience. Safe generalities, sufficiently like the generalities of this world to remind us that imagination may alter, but cannot create, make up the bulk of the narrative. We find nothing quite unlike our present surroundings. We do not find any clue to the manner in which life is maintained upon those planets that are placed under physical conditions widely different, probably, from those of the earth; and we suspect that Mr. Harris, on his "natural plane," is not aware of the difficulties of this kind that are perceived by philosophers. However this may be, he contributes nothing to their removal; and the want of the details which such a spiritual traveller ought to relate, leads us to conceive that his book, as far as there can be a more or less in the matter, is less true than Gulliver's travels.

In support of this opinion, there is, moreover, something like positive evidence, if it be searched for. We must be content with a single illustration:

Swedenborg, whom, in all essential matters, Harris professes to confirm, describes the "angelic language" as surpassing the power of man to conceive, and as resulting from a direct relationship between sounds and ideas. Harris, describing an angel originally from the planet Saturn, writes, "He spoke in a language which seemed composed of liquid sounds, divested of all harshness." And yet we read, in the same volume: "There is a planet beyond the orbit of Neptunus, as it is externally styled, *which is called Polyhymnia* BY THE ANGELS. If it were Πολύμνια, or even Polymnia; but Polyhymnia! and by the angels! It would not perhaps be inconceivable that an angel should speak Greek to Mr. Harris; but anglicized Greek is too much of a good thing; and the words quoted certainly imply that the planet is called Polyhymnia among themselves. We read also of another planet, "between the sun and Mercury, *called Corona*;" and why one planet should have a name that is half Greek, and another, one that is entirely Latin, we must confess ourselves wholly at a loss to understand.

There is another objection to Mr. Harris's writings, one that it is painful to urge, and yet not possible to ignore. The *Arcana of Christianity* abounds with passages concerning sexual love, earthly, planetary, angelic, and demoniac, until, indeed, directly and indirectly, the relations between the sexes furnish the most prominent subjects in the volume. Some of the passages are only voluptuous; others absolutely filthy. In Polyhymnia "the yieldings of the bride are in obedience to the descent of a direct influx from the Lord Himself; but more than this I am not permitted to narrate. The bliss of nuptials

is prolonged to the close of life, when it gently merges into immortality. The wife is as fond at ninety, about which period translation generally takes place, as in the sabbatic rapture of the bridal dawn. They have no name for coldness, because it is never experienced, nor are the wives ever satisfied but to rest in their husband's embraces, &c., &c." In this world "those unfortunate creatures who prostitute their bodies for gain, are attended by demons, who live, as to their subtle organic parts, so for as they are magnetically extended into the subtle realms of nature, by absorbing into their bodies the degraded substance which otherwise might become inwrought into the corporeal tenements of little children. Hence it is that after a period they (qq. the demons) are able to become mothers no more." We cannot give any other examples of this balderdash; but all practical physicians will agree that such an excessive prominence of erotic ideas throws great light upon the condition of the author of the work; and forcibly suggests the means by which that condition has been produced.

It is curious, moreover, that similar thoughts and feelings were commonly manifested by those persons who, in the sixteenth and seventeenth centuries, abandoned themselves to the delusions of pretended witchcraft and sorcery. The explanation may be, however, that the great majority of these unfortunates were crazy; and therefore, as sexually excited lunatics are always a numerous class, and as demonomania was, at that time, the prevailing type of insanity,—so the frequent combination of the particular depravity with the particular hallucination may be ascribed, perhaps, to necessary coincidence alone. Whatever the explanation, there can be no doubt about the facts; for the accusations against the supposed witches and sorcerers always imputed, and their confessions under torture always admitted, actions prompted by morbid sexual desire. For instance, the following passage is cited by M. Figuier from the official abstract of the confessions of persons condemned for sorcery and witchcraft, in 1609, by MM. Espagnet and Delancre, commissioners appointed by Henri IV. to investigate and punish an outbreak of demonomania in the neighbourhood of Bayonne. The original is given in the French language; but, from considerations which Mr. Harris ignores, we have thought it best to present it to our readers in Latin.

"Modum reperierunt quo uxores amplexibus maritorum abripiant; et, sancto sacroque vinculo conjugii violato, mœchantur et fruuntur coram ipsis maritis, qui, velut statuæ immobiles, sui honoris damnum conspexerunt sine potestate ut tanto sceleri obstant. Ipsa conjux, muta, coactâ silentiâ superata, frustra auxilium mariti implorat:—maritus, fasciatus, impotensque,

oculis apertis, decussatisque brachiis, suum dedecus aspicere compellitur.

“Saltare inverecundissime, epulari fœdissime, cum demoniis copulare, blasphemare turpissime, ulcisci insidiosè, omnibus libidinibus horrificis subsequi, pædicare flagitiosissime, bufones et viperas de voluptate animi alere, omnigena rara aconita habere, caprumque graveolentem amare et amplecti, feruntur.”

The conclusions that force themselves upon us, after this hasty review of the physical and literary phenomena of spiritualism—may be summed up very briefly. We think that these phenomena are the results of three elements, hypnotism, fraud, and delusion; and that these have all been present in almost every *séance* of which we have seen any record. It is clear from internal evidence that the works professedly dictated by spirits contain nothing that might not emanate from the brain of the medium; and that their lofty pretensions cannot for a moment be sustained in the face of criticism. We do not feel called upon to attempt to separate mere folly from actual fraud, or to indicate on which side of the boundary line our personal convictions would induce us to place this or that prominent believer. We say farewell to the so-called Spiritualists as a whole; wishing the rogues more honesty, and the dupes more sense.

ART. II.—MEDICAL OBSERVATION.—DIPHTHERIA.

THERE are few of us who do not possess a friend with whom spectacles are a necessity. There are few probably, who, while indulging in a quiet morning gossip at the fireside with such a friend, have not witnessed a scene somewhat after this fashion: Suddenly he has started from his seat and rummaged here and there among the papers and books on the table, then he has peered intently behind and between the ornaments on the mantel-piece. Anon, the face mantling with irritation, he has darted hither and thither in the room, now tossing aside the odds and ends heaped upon this piece of furniture, now the articles piled upon that. Finally, hastening to the bell-pull he has rung violently, and almost before John Thomas or Mary Jane, as the case might be, has entered the room, he has exclaimed, “Go quickly to my dressing-room, and see if I have not left my spectacles there—” “Spectacles!” we have cried, “spectacles! why, my dear fellow, they are upon your nose!”

Now, with all due respect, we think that, as concerns diphtheria, the profession has been guilty of a fit of absence of mind

not unlike that which was manifested by our friend with the spectacles in the little scene we have just depicted.

“Diphtheria,” writes Mr. Simon in his second and comparatively recent Report on Public Health to the Privy Council, “had been prevalent in parts of England two years before there was any public knowledge of the fact; and under these circumstances, it has scarcely been possible to procure any trustworthy record of the first beginnings of the disease.” In truth, it was towards the end of 1857 when it became generally known that a most fatal affection, of a character unfamiliar to the majority of English medical practitioners, had made its appearance in the kingdom, and had assumed an epidemic form. At the first sound of alarm the profession sought here and there, and ransacked our own and foreign medical literature, for such light as could be thrown upon the nature and characteristics of the deadly visitor. The medical literature of France, in which country the affection had long been known, was in an especial manner scrutinized, and in a short time a mass of important information was gathered together. But, unfortunately, while thus engaged in casting about for the much desired knowledge, we had almost entirely forgotten to note all those little items connected with the first appearance, and the subsequent development of the disease, which were occurring under our immediate observation, and as a consequence of this oversight (to use the mildest term) now that it has been thought proper to try to recover the early history of the epidemic, we are compelled to admit that it is scarcely possible to procure any trustworthy record of the first beginnings of the disease.

The profession, indeed, in the first excitement caused by the outbreak of a formidable malady, new to the greater portion of medical men of the present generation, forgot the true spectacles which ought to be, and it is to be presumed are, upon every medical man’s nose, and there being no one standing by, as in the case of our friend, to rouse us at the earliest opportunity from our forgetfulness, we did not discover our error until we attempted to fit upon the nose another pair of glasses, rummaged out after no small amount of trouble.

It is not to be denied that since the full development of the epidemic much valuable information has been gathered respecting diphtheria, as witness more especially the reports of Drs. Greenhow and Sanderson, printed in Mr. Simon’s report. Our quarrel rests with the fact of the absence of reliable information respecting the early development of the epidemic. This defect is all the more vexatious, and the lesson to be learnt from it ought to be all the plainer, because such an admirable opportunity has not been afforded to the medical men of this country, for the scientific

study of the origin of an epidemic, and for putting our knowledge of the laws of epidemics on a sounder foundation, since the first outbreak of cholera in 1832.

Thus stand the facts, that, since 1855, a deadly epidemic of a well-marked, but with us of the present day, in this country, novel disease, has broken out among us, has swept over the greater part of the kingdom, is still extending its ravages, and is apparently going to become domiciled among us, and yet we can give no account of the beginning of this disease. Nay more, in discussing that beginning, and also that fundamental problem of epidemiology, the development of epidemics, we have not essentially advanced one step beyond the theories entertained eighteen centuries ago. Of diphtheria, as of cholera, we question whether the disease was brought among us by contagion from without, or whether it was developed solely by causes acting within, the kingdom. And so we find Philo,* the physician, asserting that in his day tubercular leprosy was a comparatively new disease in Italy; and Pliny the elder† maintaining that the affection had been conveyed into Italy by the troops of Pompeius Magnus, when that general returned from Asia; while Athenodorus,‡ the philosopher, contends against Philo, that the disease had long existed in Italy, and that in their days it had solely become more prevalent, increasing also in virulence. Could anything show more clearly the existence of a chronic and fundamental defect in medical observation than the persistence at the present time, in every essential respect, of the same vague pseudo-scientific theories concerning the origin of epidemic diseases which existed in the first century?

If we would remedy the deficiency here adverted to, it is requisite first of all that we should endeavour to ascertain the causes which give rise to it. Now, it is evident that the power of removing the evil will be in proportion to our comprehension of its nature. This, we think, may be best obtained by an examination of the two chief inquiries which have been instituted into the reigning epidemic, the one under the authority of the Privy Council, the other by the Council of the Epidemiological Society.

The first-named inquiry was conducted (after the usual mode of Privy Council inquiries concerning epidemic disease) by highly qualified inspectors sent from London to the principal seats of the disease, and by correspondence with infected districts. The inquiry was confined solely to infected districts, and was instituted in such localities only after the disease had unmistakeably broken out in them. It is obvious that an inquiry thus carried

* *Plutarch, Sympos. B. viii. c. 9.*

† *Nat. Hist., B. xxvi. c. 5.*

‡ *Plutarch, Sympos. B. viii. c. 9.*

out, however valuable and requisite in many respects, must, in all that relates to the origination and development of the epidemic, be entirely dependent upon the habits of observation possessed by local observers. These being defective, we should expect to read "it has been scarcely possible to procure trustworthy records of the first beginnings of the disease." Again, the absence of all comparative observation, that is to say of observation carried out in uninfected districts as well as infected, or of information on the progress and characteristics of allied affections over a series of months or years preceding the inquiry, at once destroys the power of scientific appreciation of the facts ascertained bearing upon the spread of the epidemic. In truth, the Privy Council method of inquiry, can at the best render but a partial account of an epidemic, and however important this may be, in reference to an immediate and practical dealing with the ravages of the disease (no doubt the great object of the inquiry), it can never supply what we contend should be the great aim of all such inquiries (since the strictly scientific must include the strictly practical), a scientific history of the rise, progress, or development of an epidemic in the kingdom, or indeed, in any one district of it.

The Epidemiological Society conducted its inquiry in another fashion. Working by a committee, it distributed a circular among its members and others asking for information on diphtheria, and drawn up so as to secure precision and uniformity in reports on the disease. The Report of the Committee, recently published,* gives a very instructive account of the manner in which this circular was responded to. The Committee state that "Although (apart from publication in the medical journals) upwards of two hundred circulars, asking for information, and containing the foregoing suggestions, were distributed in various parts, over almost the entire surface of the kingdom, and notwithstanding that, several weeks after the distribution, the attention of many non-resident members of the Society was particularly directed, by a brief note, to the importance of giving the information sought in the circular, the Committee regret to have to state, that during the ten months that the inquiry has been kept open, they have received only *thirteen* specific reports on diphtheria, and *twenty-two* replies, in which the writers state, in very general terms, either the entire absence of diphtheria from their localities, or a lack of personal, or a very slight acquaintance with the disease."

Again, in concluding their Report the Committee state:—

"That although the information obtained by them in the present inquiry is exceedingly imperfect, yet it is sufficient to show that if the inquiry had been supported by the members of

* *Transactions of the Epidemiological Society of London*, vol. i. part 1, 1860.

the Society to the extent that the committee had hoped it would have been, a large amount of most valuable information respecting diphtheria would have been obtained—information of a character that can be obtained in no other manner than by the systematic co-operation of many and widely separated observers to one and the same end. The committee would suggest that the Society should take into consideration the propriety of adopting other and additional means (if such can be devised) for promoting or insuring a more satisfactory co-operation of its members in such inquiries as the Society may set on foot; for the committee feel assured that the present inquiry has proved less successful than might have been anticipated, not so much from indisposition of the members to aid, as from an erroneous estimate of the value of the information which they possessed relative to the subject of inquiry. Thus in the majority of letters with which the committee have been favoured in answer to their circular, the writers have contented themselves simply with stating that diphtheria has not appeared in their neighbourhood, or that they have seen but one or two cases of the disease, and that consequently their experience would be of no value to the committee, notwithstanding that the committee had specifically asked for particular information respecting the prevailing character of throat affections where the disease had not manifested itself, and for many items of information where it had, even if it were but in a solitary instance."

These observations of the Diphtheria Committee of the Epidemiological Society, showing the extent and indicating the sources of the failure of the inquiry conducted by it, are of great interest. What was to be deduced from the result of the Privy Council inquiry, is here made more clearly apparent, to wit, the absence of any methodic system of epidemiological observation among the medical men of the kingdom, and the results of both inquiries most conclusively show that without this preliminary observation all general inquiries whatever into the nature and development of epidemics must of necessity prove more or less abortive. The local inquiries instituted by the Privy Council, in infected localities, and carried on by men accustomed to medical researches, lead to the accumulation and verification of a vast amount of information of unusual value and essential to a knowledge of epidemics. The names of the inspectors, and above all of the distinguished medical officer of the Privy Council, Mr. Simon, are a sufficient guarantee for this being the case. The actual results of the inquiry made by the Epidemiological Society, although meagre, are by no means wanting in value, and particularly in suggestiveness; but neither the method of inquiry adopted by the medical officer of the Privy Council nor that made use of by the

Epidemiological Society, can be looked upon as meeting the requirements of epidemiological observation at the present time. In fact, we possess no system of epidemiological observation which can be legitimately termed scientific, and for the lack of this the greatest opportunity for accurately noting the origin, the rise, and the progress of a great epidemic which has ever been presented to the medical profession of any country under the sun, has been almost utterly lost to us. It would be foolish to waste time in speculating what might have happened had we been enabled to observe accurately the epidemic from its earliest foreshadowings, but truly one cannot prevent some feelings of vexation when, knowing how greatly our knowledge of the predisposing causes of epidemics has been developed of late years, we remember that in the early history of outbreaks such as that of diphtheria, we can alone hope to obtain an explanation of the incongruities and anomalies which beset our knowledge of the exciting causes of epidemics, as well as a sounder acquaintance with the etiology of these outbreaks in general. The mischief, however, being done, it remains for us to set ourselves heartily to work to prevent the recurrence of such an evil. The lesson should be a bitter one to those who will read it rightly; let us try to make it an useful one.

We hold that the lesson clearly teaches us that the great defect with which we have to contend in this matter is the absence of a true system of epidemiological observation. This being admitted, the question follows, how is this evil to be remedied?

At the first glance it might seem that an authoritative Registration of Disease would solve the question and supply the method sought. This we think is an error. A Registration of Disease is undoubtedly a necessary element in a thorough method of observation, and consequently it is incumbent upon the profession, on this account, as also on account of the immediate advantages that would arise to the nation out of such a registration, to aid heart and soul those men who are now struggling to secure so great an addition to the statistical records of the kingdom. But while a registration of disease would give us positive information as to the existence, the amount, the variations in time and place, and the distribution of different diseases in the country, it would be silent, however well conducted, and almost of necessity, regarding the development, the mutations in form, or (assuming such a thing) the transformations of disease. A registration of disease, together with the records of mortality, would furnish us with the positive facts of disease in a given locality, district, or country, and would provide us with the most accurate basis for the study of the etiology of any given disease or class of diseases, but it would not, and, indeed, could not,

supply that accurate study of the phases of disease, and of the alliances of diseases, upon which the unravelment of the laws of etiology must ultimately depend.

We hold then that, even if, as is to be hoped, a registration of disease be shortly obtained, the defects of existing methods of observing epidemics will in a great measure remain, and these we believe can only be got rid of by the formation of a corps of competent observers, banded together for one and the same object, and working steadily upon one and the same system.

If we reflect upon the subject, few things are more remarkable than that, with the large number of highly qualified scientific medical observers which so markedly characterizes the medical profession of this country, there should be so entire an absence of any combined system of observation, not only on epidemiological questions, but on all questions connected with the prevalence or spread of disease. But the fact of the existence of numerous individual observers scattered over the kingdom, would indicate that the formation of a corps working together to one end is a feasible project. Moreover, the experiment has in part been tried. For when Dr. Richardson established the *Sanitary Review*, he projected a scheme for the registration of certain facts concerning epidemics in the pages of that journal, and contributors at once and willingly tendered their services from all parts of the kingdom.

The method of observation would prove a much more difficult matter to solve, for, dealing chiefly with the most obscure questions of epidemiology, it must, in the first instance, be of necessity tentative. But even here, the recent investigations into diphtheria yield us considerable light, and plainly indicate the chief points at which a method should aim. It should be—

1. Directive of observation.
2. Calculated to foster habits of combined observation among the profession at large.
3. It (and most emphatically we would say this), should be conceived in such a manner as to react upon our schools of medicine, so that the habits spoken of may, in the first instance, be developed, and the system of observation determined upon learned, there.

That is to say, the method should be calculated for the future as well as the present, we of this generation not merely seeking to widen the foundations of knowledge for the next, but also endeavouring especially to train up the nascent representatives of that generation in those habits of observation which we ourselves mostly fail in.

The London Medical Society of Observation did good service by the publication of its manual on *What to Observe at the Bed-*

side and after Death in Medical Cases; and Dr. Ogle has also done good service by the recent publication of a paper on the *Clinical Observation of Diphtheria*, in Beale's *Archives of Medicine*. The work of the Medical Society of Observation must be looked upon as having fostered more accurate habits of clinical observation; and it is to be hoped that Dr. Ogle's paper will induce a more systematic observation of cases of diphtheria. Both works are indeed highly valuable contributions to a better system of medical observation, but neither meets the defects we have pointed out. Can these defects be remedied in the fashion we have indicated? We think that they may, and that, moreover, that the Epidemiological Society is the machinery by which the reform may be best carried out. If the Society would grapple with the suggestion of its Diphtheria Committee, that is to say, "take into consideration the propriety of adopting other and additional means (if such can be devised) for promoting or insuring a more satisfactory co-operation of its members," we feel little doubt that it would soon get to the core of the matter.

ART. III.—CRIMINAL LUNATICS.*

AN attempt to popularize the subject of Criminal Lunatics, which appeared in the New Serial of last month, and which is founded upon, and indeed is mainly a reproduction of, Dr. Hood's letter to the Chairman of the Commissioners in Lunacy, renders it in some sort incumbent on us to examine the views put forth in that pamphlet—a task which, from a cursory perusal of the publication when first it appeared, we did not then feel called upon to undertake.

Dr. Hood's exponent in our able contemporary, *Temple Bar*, adopts (by implication, at least) all that gentleman's views and suggestions for the amendment of the law relating to Criminal Lunatics. These views we shall proceed to consider *seriatim* and in order.

Our author in introducing his subject, remarks that the term "criminal lunatic" is at present indiscriminately employed in relation to two distinct classes of offenders—namely, those who having been exempted from judicial punishment on the ground

* *Temple Bar*. No. I.

Criminal Lunatics, a Letter to the Chairman of the Commissioners in Lunacy, by W. Charles Hood, M.D., Physician to Bethlehem Royal Hospital. London. Churchill. 1860.

of insanity, are thereupon ordered to be detained in safe custody during her Majesty's pleasure, and those who have become of unsound mind while undergoing punishment for offences committed when sane, and who ought therefore to be termed "*insane convicts*," or "*insane prisoners*;" and he afterwards states that it is to the mode in which the first class, those acquitted on the ground of insanity, ought in future to be treated, that he wishes chiefly to solicit attention. There is a slight inaccuracy involved in treating the first class, as including only those acquitted on the ground of insanity; since it also includes those who, being found insane upon arraignment, are not called upon to plead, and, therefore, not being tried, cannot be said to be acquitted. This is an oversight of little importance, apart from the evidence it affords of the imperfect state of the writer's knowledge of his subject. It is impossible, however, to read without astonishment and some degree of alarm an assertion made by the Physician of the Bethlehem Royal Hospital, that the return of sanity in no sense implies or necessitates the restoration to liberty of a person confined under a warrant for "safe custody during her Majesty's pleasure." We apprehend, and we shall continue of this opinion until we have reason to know that the officers of State act upon any other hypothesis, that, excepting cases in which the original acquittal is deemed to have amounted to a miscarriage of justice, the return of perfect sanity being proved, the prisoner's discharge would be allowed as a matter of right. Having regard to the present imperfect state of mental science, the Legislature has thought fit in the interest of the community, but not by way of punishment, to place the liberty of criminal lunatics at the absolute disposal of the Executive; but this power was granted and is held upon an implied trust, that liberty should be granted when the public safety no longer required that it should be withheld; and if this trust were repudiated by the Executive, as it seems to be by our author, Parliament would find it necessary to provide for the public safety in some other way. The lack of knowledge, indeed, is the only justification for this expedient; and whenever philosophers or psychologists are able to demonstrate the truth of any general rules whereby we may know that a man once proved lunatic has recovered the perfect use of his faculties, the Executive will assuredly be called upon to resign this extraordinary power into judicial hands. Dr. Hood proposes that, as regards lunatics guilty of slight offences, "namely, those convicted of assault, want of securities, and such like,"* the juris-

* In the previous paragraph we are informed that "it is the privilege of every English subject to be held responsible to the laws of his country only so long as he remains of sound mind," the writer ought therefore to know that the persons he is writing about cannot be convicted.

diction of the Commissioners in Lunacy should be enlarged, and that they should be empowered to discharge such prisoners on their restoration to reason, on the guarantee of relations or friends that they should be prevented from again disturbing the public peace. Our knowledge of law does not justify us in making any observations upon this proposal, so far as it relates to the case of those unhappy individuals, if any such there be, who are "convicted of want of securities;" but with regard to lunatics "convicted of assault," in so far as the suggestion rests upon the idea that this is a slight offence, a little consideration, we think, will show that it is inadmissible. An assault committed by a lunatic is a totally different thing from an assault committed by a person whose impulses are under the control of reason; in the one case, the act is a crime the magnitude of which is fairly measured by the injury done, because it can be properly assumed that the offender intended to do what he did, but no more. In the other case the act is no crime, the malicious intent being wanting; but the controlling power being also wanting, it is impossible, in the abstract, to assign any limit to the danger to be apprehended from an individual who may have committed any breach of the peace in a state of lunacy. We do not say that every lunatic who commits a breach of the peace ought to be confined for life; but we say, that the propriety of liberating such a person involves considerations perfectly independent of the nature of the specific act which may have brought him within the cognizance of the law.

The question still remains whether, under any circumstances or with regard to any class of cases, the power of discharging persons under confinement for "safe custody during her Majesty's pleasure," could be properly transferred from the high officers of State with whom it now rests to the Commissioners in Lunacy. We think it could not. The power in question should be exercised judicially, following upon an inquiry as to whether the applicant for liberty has been restored to reason, or to such a degree of reason that he may with safety to the public be admitted to liberty, conditional or unconditional, according to the circumstances of each particular case.

In reference to this inquiry, it is the duty of the Commissioners in Lunacy to watch over the interests of the public which are necessarily opposed to those of the individual; and the performance of this duty is therefore incompatible with the exercise of the judicial function of deciding the question raised by the inquiry.

Dr. Hood considers that some legislative measure is required, which should define under what circumstances, and to what extent, if at all, persons coming under the following classes may be discharged:—

“*Firstly*, those who, under the influence of mental disease, have committed or attempted murder or other grave offences, and who are liable to such sudden ebullition of homicidal mania, that no laws can bind them, and no companion or friend be safe from their attack; and, *secondly*, those who have feigned insanity to escape conviction, and who, through the exertions of astute counsel, supported by *ex-parte* medical evidence, have been acquitted of murder or attempted murder, or other grave offences, on the ground of insanity, but who, nevertheless, through a series of months or years, while subject to the close surveillance of an asylum, evince no symptom of a disordered mind.” (p. 7.)

Dr. Hood himself offers no suggestion as to the nature of the measure which he thinks is required; nor does he define the circumstances which, in his opinion, would justify the discharge of either of these classes. At this omission we are not much surprised, as with respect to persons coming under the first class we suspect it would tax his ingenuity not a little to suggest any possible circumstances which would justify their discharge at all; and with respect to the second, the question is how are we to get rid of such a class altogether. Can we by any improvement in the system of criminal procedure greatly lessen or altogether prevent the failure of justice which the existence of such a class denotes?

It would appear from the next suggestion made by Dr. Hood, two pages after the last quotation, that this question was not absent from his mind, though he has not placed it clearly before his readers. His suggestion is that—

“Whenever insanity is *set up* as a defence, the trial of the prisoner for the offence with which he is charged, whatever may be the stage at which it has arrived, should be postponed until the state of the prisoner’s mind at the time has been made the subject of inquiry, at the same or some following session or assize, as the case may be, and as then shall be directed before an ordinary jury, whose verdict of insanity, if such it shall be, shall in all cases be recorded by the Court, as an answer to the previous indictment. It seems, indeed, [says Dr. Hood] altogether inconsistent and contradictory to allow a prisoner to allege that he did not commit the offence for which he is charged, and that when he did commit it he was of unsound mind; yet both these grounds of defence are admissible under the plea of not guilty.” (p. 10.)

The miscarriages of justice to which reference has been made are mainly due, as we have before stated in this Journal, to the necessarily imperfect opportunities which the witnesses to the state of the prisoner’s mind have had of forming the conclusions upon which their evidence is based; and we have already pointed out that a simple remedy for this evil would be found in giving to the judge in criminal cases, the power which he has in civil cases, of adjourning a trial after it has begun, for the purpose of

obtaining further evidence. Under ordinary circumstances, no doubt such a power is not needed on the criminal side; because, unless the prosecutor makes out his case, the accused is entitled to his discharge; and unless he is able to prove his accusation, he ought not to bring the case into court: but where the act charged is proved, and the defence relied on is insanity, provided there be some evidence of it, there appears to be no objection to a reasonable delay, for the purpose of further evidence if necessary. This is a defence which the accused is bound to prove affirmatively as satisfactorily, as the prosecutor is bound to prove the facts charged in the indictment; and if successful, the prisoner is not entitled to his discharge from custody: therefore if the point at issue is in any degree doubtful, no question regarding the liberty of the subject stands in the way of the course proposed. So much, therefore, of Dr. Hood's suggestion as relates to the postponement of trials where evidence of insanity is offered in defence, coincides with views which we have previously expressed, and which we still retain; but for the rest we entirely dissent from him. We think that so much of the indictment as depends upon the facts alleged, should be proved and found by the jury before any adjournment should be ordered; and as to its being inconsistent, and contradictory, to allow a prisoner to allege that he did not commit the offence, and that when he did commit it he was insane, the supposed inconsistency and contradiction are pure figments of the writer's own invention, since it is quite unnecessary that the prisoner should allege that he did not commit the offence. The prosecutor alleges that he did, and is bound to prove it. Every legal authority agrees, that the plea of not guilty amounts to no more than the mere expression of a wish to be tried according to law, and is not an assertion of innocence.

A further suggestion which Dr. Hood thinks it necessary to make for the amendment of the law is thus expressed:—

“Again: it seems proper that some statutory provision should be made whereby those prisoners who become insane before trial, or are found upon arraignment to be of unsound mind, might, upon recovery, be duly tried and disposed of according to law, without leaving the responsibility of advising prolonged imprisonment or immediate discharge to the Secretary of State for the Home Department.” (p. 12.)

Fortunately for the credit of the law, but most mal-apropos to his suggestion, Dr. Hood quotes the following case, which he thinks “will *perhaps* show the necessity for some such enactment.”

“D. D. was indicted for murder at the Worcester assizes, 1852, and being found insane at the time of arraignment, was without delay re-

moved to a lunatic asylum. In the summer of 1856, having recovered from the mental disease, he claimed to be tried for the offence with which he was charged, and being found guilty of manslaughter, was sentenced to two years' imprisonment. This term of punishment he underwent, and at the end of the period was discharged." (p. 12.)

What D. D. did under the law as it stands, his prosecutor might have done, and therefore the suggested amendment is unneeded. In a subsequent page, however, Dr. Hood, assuming the duty of a parliamentary draughtsman, gives us his views of the required amendments more precisely in the shape of clauses to be inserted in an Act of Parliament to be passed, repealing the existing statutes relating to criminal lunatics, and re-enacting the valuable parts of each with Dr. Hood's new clauses. Referring to this part of his pamphlet, we gain a fresh insight as to the views with which he makes the last suggestion we have quoted, and as to the bearing of the cases of J. F., J. P., and C. B. W., as quoted in support of such suggestion. It appears, then, as part of Dr. Hood's scheme for the amendment of the law, that, on a prisoner pleading insanity, the truth of that plea is to be tried before trying the truth of the facts charged in the indictment; that, if the defence is proved, the prisoner is to be sent to an asylum, whence, upon its being certified that he has become of sound mind, he is to be brought to trial upon the original indictment, and if found guilty—which he may be, *notwithstanding he was previously found insane at the time of committing the offence*, then "the Court shall record the sentence that would have been passed if the prisoner had been found guilty of the offence, and not insane at the time of committing it." (p. 23.)

Pausing here, let us consider how this would work in the case of a lunatic charged with murder. He is brought to trial, and pleads insanity at the time of the offence. The trial is thereupon postponed, and another jury is empanelled at a subsequent court to try the alleged insanity, and if they find for the prisoner he is sent to an asylum, where it is to be hoped there will be so little attention paid to his disease that he will not recover; for if he do, it will be the duty of the surgeons attending him to certify the fact to the Secretary of Staté, whereupon the unhappy man will be again brought to trial, and if found guilty, as he most likely will be, of the offence, but insane at the time of committing it, the Court will record sentence of death—that is to say, the sentence that would have been passed if the prisoner had been found guilty of the offence, and not insane at the time of committing it. Dr. Hood, however, seems to have reconsidered this possible event after going to press; for in a foot-note on page 24 he tells us that "prisoners of this kind found guilty of murder, or any

offence for which the sentence of death or imprisonment for life would have been passed, will remain in confinement in a prison, asylum, or other proper receptacle for life."

We gather from this that before the Act goes into the Queen's printer's hands, a clause will be added to this effect. Great care should be taken that this is not overlooked; for as the text stands at present, the poor man will inevitably be hanged for an act committed when admittedly insane.

It is but fair to add, however, that it is only in the serious cases that the lot of the criminal lunatic will be so frightfully altered by this new law; for if the sentence be one of imprisonment for a definite term, then it will be taken to have commenced when he was first sent to an asylum; and if the time he has been there is equal to the term of his sentence, he will get his immediate discharge; if not, he will only have to make up the difference. Any way, however, after this Act passes, we must all understand, that short of death, lunatics will have to submit to the same punishments as other men. To render the law consistent, however, with itself, it will be necessary to pass another short Act, declaring that from the date of the passing thereof, malicious purpose, or felonious or unlawful intent, shall not be required to be proved in order to establish any criminal offence, any law, statute, or custom to the contrary thereof in anywise notwithstanding.

ART. IV.—ON THE EXPOSITION OF THE PRINCIPLES AND DETAILS OF THE SYLLOGISM.

By R. G. LATHAM, M.D., F.R.S., &c.

IN the present paper little or nothing will be said as to the utility of the so-called syllogistic logic; it being clear that the reasons in favour of, or against it, must lie less in the absolute value of the study itself, than in the relation borne to the time and trouble bestowed upon it. A comparatively unimportant pursuit that takes up but little time, and displaces but a small amount of other acquirements, may be a fitter object of education than a comparatively important one which demands the best energies of half a lifetime.

If so, the manner in which any subject is taught, is an important element in the value of the subject itself. Let the principles on which this is founded be bad, and let the details be irrelevant; let the unnecessary accessories be abundant, and let the doctrines of the different teachers be discordant, and the result will be, in

the language of the great American utilitarian, *a whistle for which we pay more than it is worth*. That the whistle itself is a bad one, by no means follows. It may be worth much; without being worth all we pay for it. Meanwhile, a whistle of inferior quality may be worth something—something which entails upon us no great sacrifice; something in exchange for which even a whistle of moderate quality is a fair equivalent.

The present writer believes that if the elements of the so-called syllogistic logic were taught in an improved manner, they would be deemed worth learning by many who, at present, think meanly of them; such mild approbation as would be accorded being given on the principle that, if they were not, in any high degree, *bona per se*, they displaced but few of the numerous things which were better than themselves. That they have *some* value no one denies. They are important in the history of human thought; even if they be unimportant as rules for thinking. Let us (for argument's sake) put them at their lowest value; but (let us, as contributors to the art of education) divest them of all irrelevant details. The ratio between the price and the purchase will then come out.

In the order in which a subject is taken, we have important elements of either economy or waste. We waste power when a study is taken up without reference to what it leads to, and what leads to it. By taking it in its proper place we economize. This is more especially practicable when the higher departments of one, are the preliminaries to another branch of study. Reverse their order, and it is clear that the loss of time and the expenditure of attention will be considerable. Continue this reversal, or find imitators who will do it for you, and the result is a mischievous mass of detail improperly distributed. Preliminary matter of the kind just indicated, from having been omitted in its right place, has to be learnt in a wrong one. A little later, it becomes an inseparable adjunct, belonging, in appearance, to a field of inquiry, in which it is, in reality, a transplanted exotic. Later still, the boundaries of the field in which it stands become indistinct, and the field looks wider than it is. It also looks more impracticable, and, in the eyes of those who measure its fruits by its size, more barren.

Two subjects, between which a relation of the kind in question exists, are Language and Logic; the preliminaries of the latter being found in the former—*when well and fully taught*. But as this is not the case, and as those who take up logic at all, for the most part take it up in ignorance of general grammar, a great deal that a schoolboy should have known from the Latin, Greek, or English accidence, has to form a sort of introductory chapter to logic—of which it soon passes for a part.

The sequence, however, of the several divisions of human knowledge, and the distribution of the details, belong to what we may call *Mathematology* in general. The question before us is the extent to which certain matters which (without belonging to Logic, appear to do so) are more properly relegated to Language, Psychology, and the Philosophy of the Classificational Sciences.

Everything connected with terms and copulas, with categorical and hypothetical propositions, with modes, with necessary and contingent matter, names, abstractions, generalizations, concepts, and the like, should be assumed as known *aliunde* ; so that our subject should begin, not with the structure of propositions, but with their conversions, oppositions, and combinations.

Nevertheless, even in the present paper, it may not be unnecessary to state, as a preliminary, that—

The *Subject* is that which we speak about ; the *Predicate*, that which we say concerning it. The *Copula* connects the two ; and is either *is* or *is not*.

Bread is cheap ; bread is not cheap.

Subjects and predicates are called terms ; and where the two terms are connected by a copula we have a proposition. Propositions convey questions, commands and declarations, or statements. It is only the declaratory proposition that finds any place in logic.

Propositions, in respect to the *quality*, are either affirmative, as *this is mine* ; or negative, as *this is not mine*. In respect to their *quantity*, they are either universal, as *all men are mortal* ; or particular, as *some men are wise*.

By putting *quality* and *quantity* together we get four sorts of propositions, distinguished by the *signs* (1) all, (2) none, (3) some, (4) some-not ; e.g.

1. *All men are mortal.*
2. *No man is immortal.*
3. *Some men are wise.*
4. *Some men are not wise.*

Of these

The first is an Universal Affirmative.

second ,, Negative.

third Particular Affirmative.

fourth ,, Negative.

In the universal negative, the negation is pure and simple, and the sign, in the English language at least, is in direct contact with the subject. This is the case with *no man is perfect* ; which, by transposition, becomes *no perfect being is a man*.

In the other, the negation, instead of being pure and simple,

is accompanied by a second sign. This is, of course, the word *some*. The presence of this, in the English language at least, engenders a slight complication. Such an expression as—

Some men are not heroes ;

is not very easily transposed. We can only effect a transposition by connecting the negative with the predicate ; as—

Some not-heroes are men.

This leads us to another question connected with what has just been exhibited ; viz., the transposition of terms. To say—

Some men are fallible ;

and—

Some fallible beings are men ;

is to say the same thing in different words ; the two propositions being, to all intents and purposes, the same.

The difference between—

No man is infallible ;

and—

No infallible being is man ;

is verbal also.

With the universal affirmative it is otherwise. How often we hear such expressions as, *it does not follow that, because all men are two-legged, all two-legged animals are men ;* this being only one instance out of many. And what does it mean ? Simply that though

All men are two-legged ;

it is only

Some two-legged animals that are men.

That these two propositions are *really*, rather than *verbally*, different, is manifest. They exhibit a difference in extent between two classes of objects. The *men* belong to the smaller, the *two-legged animals* to the larger.

From what has preceded we may now see that the transposition or conversion of terms is pure and simple in the case of the particular affirmatives and the universal negatives only ; in each of which the predicate may become the subject, and the subject the predicate, by reversing the order of them.

How do the four kinds of propositions comport themselves towards each other ? Knowing this, we have a logic of *two terms*.

Every man is fallible ;

Some men are not fallible.

Of these, one must be true, one false. To affirm the first is to contradict the second, and *vice versâ*. Propositions of this sort are called *contradictories*. They differ in both quality and quantity; one being affirmative and universal, the other negative and particular.

*Every man is fallible;
No man is fallible.*

Of these propositions each may possibly be false, and only one can, under any circumstances, be true. They are said to be *contrary*, or *contraries*, to one another. They differ in *quality*; one being affirmative, the other negative. In *quantity* they agree; both being universal.

*Some men are fallible;
Some men are not fallible.*

These are *subcontraries*. Both *may*, and one *must*, be true. They, like the ones by which they are preceded, differ in *quality*, but agree in *quantity*, being both particular. Only one, however, is affirmative.

*All men are fallible;
Some men are fallible.*

Here the truth of the universal, carries with, as a matter of necessity, the truth of the particular, proposition. If *each and all* the members of a given class have a certain quality, *some* of them *must* have it. Propositions of this kind are called *subaltern*. They differ in *quantity*, agreeing in *quality*. The ones under notice are affirmative.

No man is perfect; some men are not perfect, are negative. Still, the difference is limited to their quantities—one being universal, one particular.

Every term implies a class; *man*, that of *human beings*; *white*, that of *white objects*. Classes are of different magnitudes; some being larger, some smaller than others. The class of *heroes* is smaller than that of *men*; the class of *men* smaller than that of *mortal beings*; that of *mortal beings* smaller than that of *beings* in general. Strictly speaking, all this is extra-logical; belonging, in part, to general grammar, in part, to the sciences of classification. The term *subaltern*, however, is more logical than aught else; though the terms *genus* and *species* are not so. Now, with fear of being charged with making an unnecessary remark, we may remind the naturalist that, in the preceding series, the *beings*, at the one end, form a *genus*; whereas the *heroes*, at the other, form a *species*. The interjacent class is *genus* or *species* as the case may be. To the class indicated by *heroes*, the class indicated by *men*, is a *genus*; being

itself but a *species*, to the class indicated by *mortals*. Such is subalternation.

And now we are on the logic of *three* (as opposed to the logic of *two*), terms—the logic of the *syllogism*, or the logic of *mediate* inference. What constitutes the logic of two terms, along with the consideration of the value of the division here suggested, may be considered hereafter. Our present object is to exhibit the doctrine of the ordinary syllogism in a simple form. It is this and something more. It is to show that its simplicity is great; its complexities and difficulties few. Here the exposition of its fundamental details begins. In a few pages, they will end. If many works on logic make even the elements difficult, the fault lies with the treatment of the subject rather than the subject itself.

The logic of the syllogism "presumes the existence of a class—indeed, of three classes. Of the principle upon which these classes are formed, it knows nothing. But it is clear that any individual, or any group of individuals which belongs to the smaller of them must also belong to the larger; must be included in it; even as the embryo contained in the kernel of a nut must needs be contained in the shell. If so, all that is wanted is the name of the individual or class. Get this, and you get a new name; get this, and you get the logic of *three* terms.

This brings in the terms *major* and *minor*, technical and logical terms. The predicate is, *essentially*, a major term; *i.e.*, the term indicating the *larger* class. The minor subject is, *essentially*, the minor term; *i.e.*, the term indicating the *smaller* class. That the major is *essentially* greater than the minor must be remembered. But it must also be remembered that the difference of magnitude is not always to be found. A *genus* is essentially larger than a *species*; but, if the genus consists of only a single species, the magnitudes of the two classes coincide. In no case, however, is the species *larger* than the genus. *Mutatis mutandis*, this applies to majors and minors. The minor is often the smaller, never the larger, class.

And now, after saying that *all heroes are men*, say that *all men are mortal*. In this case *heroes* is still a *minor*, and *men* a *major*. But it is not a *maximus*. Or say that *Cæsar* is a *hero*. In this case *hero* is still a *minor*, though not a *minimus*.

We do not, however, use the terms *maximus* and *minimus*. We call the intermediate term a *middle* term—the word being, again, technical. It is the name of a *subaltern* class. Now any member of a subaltern class must, perforce, be a member of the class to which the subaltern is subordinate; in other

words, a minor which is in a middle *must*, also, be in a major. If *all men (middle) are mortal* and *all heroes (minor) are men*, *all heroes MUST be mortal*.

All men are mortal ;
All heroes are men ;
All heroes are mortal.

The same, *mutatis mutandis*, in cases of exclusion.

We may call all this a truism. Truism or not, it is the basis of a great part of logic.

The term determines the proposition ; *i.e.*, the proposition which contains the major term is the major proposition, whilst that which contains the minor is the minor. The term which contains the inference is called the conclusion. The three together constitute the syllogism : of which the first two are called the premises. One premise contains the major and middle, and the other the minor and the middle. Their order is indifferent. In the conclusion the minor term is the subject, the major the predicate.

Where the terms are capable of pure and simple transposition, or conversion, the difference between the predicate and the subject is abolished ; or rather the same term may be either one or the other. The same term, under similar circumstances, is also either a major or a minor ; or, rather there is no apparent difference between the two, the relative magnitudes of the two classes being incapable of being measured.

We may say—

1.

No man is perfect ;

or—

No perfect being is man.

2.

Some men are wise ;

or—

Some wise beings are men.

From two particular propositions in the ordinary syllogism, nothing can be inferred : neither can anything be inferred from two negatives. Let the major, however, be universal (either affirmative or negative), and let the minor (subject to the rule against the concurrence of two negatives) be anything whatever, and, of some sort or other, a conclusion *must* follow. Of this conclusion the nature is regulated by the premises. It cannot be more affirmative than the more negative, nor more general than the more particular, of the two. Thus with—

No man is perfect ;
Some rational beings are men ;

the inference is,

Some rational beings are not perfect.

The order of the *premises* (as aforesaid) is indifferent. Whether we say—

*All men are mortal ;
Socrates is a man ;
Socrates is mortal ;*

or—

*Socrates is a man ;
All men are mortal ;
Socrates is mortal ;*

is indifferent.

The order of terms, when they are reciprocally interchangeable, is indifferent. We can say—

Some rational beings are mortal ;

or—

Some mortal beings are rational ;

just as we can say—

No man is perfect ;

or—

No perfect being is a man.

When the proposition, however, is universal and affirmative, no such conversion can take place.

All men are mortal ;

is not equivalent to—

All mortals are men.

In common language, expressions, like *some men are wise*, imply that *some* are not. In logic, *some* merely means *more than none*. It may mean *one* ; it may mean *all*.

Again, singular terms, like *Socrates*, &c., are universal. What we say of *Socrates* we say of the *whole of him*. Hence, such a proposition as—

Cæsar is a hero ;

is as truly universal as such a one as

All heroes are men.

The preceding conditions give us a conclusion. Let us now add that none but them gives us one.

If so, we have only to calculate the combinations. Doing this, we begin with propositions considered in respect to their Quality and Quantity only.

1.

1. Universal affirmative.
2. Universal affirmative.
3. Universal affirmative.

2.

1. Universal negative.
2. Universal affirmative.
3. Universal negative.

3.

1. Universal affirmative.
2. Particular affirmative.
3. Particular affirmative.

4.

1. Universal negative.
2. Particular affirmative.
3. Particular negative.

5.

1. Universal affirmative.
2. Particular negative.
3. Particular negative.

EXAMPLES.

1.

1. *All men are fallible ;*
2. *All heroes are men ;*
3. *All heroes are fallible.*

2.

1. *No man is perfect ;*
2. *All heroes are men ;*
3. *No hero is perfect.*

3.

1. *All men are fallible ;*
2. *Some rational beings are men ;*
3. *Some rational beings are fallible.*

4.

1. *No man is perfect ;*
2. *Some rational beings are men ;*
3. *Some rational beings are not perfect.*

5.

1. *All slaves are discontented ;*
2. *Some Africans are not discontented ;*
3. *Some Africans are not slaves.*

The sequence of the propositions as universal affirmative, universal negative, and the like, gives to the syllogism what is called its *mood*. We have just seen that the moods are five in number—five in number, and no more.

The number of syllogisms, however, is greater than that of the moods. This is because there is such a thing as *figure*. Transpose, when it can be done, our terms, and we shall see what this means. We can tell, too, *à priori*, what transposition will do. In every negative, and in every particular proposition, it will give a fresh form.

1. No change ; both the premises being unsusceptible of conversion.

2. Conversion of—

1. *No man is perfect ;*
2. *All heroes are men ;*
3. *No hero is perfect.*

into—

1. *No perfect being is a man ;*
2. *All heroes are men ;*
3. *No hero is perfect.*

3. Conversion of—

1. *All men are fallible ;*
2. *Some rational beings are men ;*
3. *Some rational beings are fallible ;*

into—

1. *All men are fallible ;*
2. *Some men are rational beings ;*
3. *Some rational beings are fallible.*

4. From the fourth we get two varieties ; inasmuch as the major proposition is convertible because it is negative, the minor because it is particular. Thus—

1. *No man is perfect ;*
2. *Some rational beings are men ;*
3. *Some rational beings are not perfect ;*

gives either—

1. *No perfect being is a man ;*
2. *Some rational beings are men ;*
3. *Some rational beings are not perfect ;*

or—

1. *No man is perfect ;*
2. *Some men are rational ;*
3. *Some rational beings are not perfect.*

5. Here we have, as a concurrent syllogism,

1. *All slaves are wronged ;*
2. *Some slaves are not discontented ;*
3. *Some wronged beings are not discontented.*

The place of the *middle term* gives us the *figure*. In the first figure it is the subject of the major, and the predicate of the minor premise. In the second it is the predicate, in the third the subject, of both.

The number, then, of *fundamental* syllogisms is ten. What is meant by *fundamental* ?

Propositions are what is called *strong* or *weak* ; their *strength* or *weakness* being determined by their quantity. The meaning of this lies so near the surface that the terms under notice can scarcely be called technical. They are just a little metaphorical. *All* is a *stronger* term than *some* ; and *some* a *weaker* term than *all*. In like manner, *all men are mortal* is a stronger proposition than *some men*, &c. That strong terms may be weakened (by writing *some* instead of *all*) is clear.

In logic, as in mechanics, nothing is stronger than its weakest part ; in other words, no conclusion can be more general than the most particular of its premises. A conclusion too strong for the premises, or a conclusion for which the premises are too weak, is no conclusion at all.

But what if the premises be too *strong* ? They *may* be so ; and that in more ways than one.

Elephants are stronger than horses ;
Horses are stronger than men ;

therefore

Elephants must be stronger than men.

This is true ; yet the middle term is irregular.

Again—

Some men are mortal ;
All men are rational ;

gives

Some rational beings are mortal,

as a conclusion—a conclusion which is particular. That the first premiss would be strengthened by being changed into

All men are mortal,

is clear. Yet the conclusion would be the same. Write—

All men are mortal ;

All men are rational :

and the conclusion that

All mortals are rational,

is as far off as ever. All that we can say is that *some* are. But this we have inferred already.

Premises, then, are *adequate* when they are neither too weak nor too strong for the conclusion. Where there is strength in excess, there is adequacy, and something more.

Where the premises are simply adequate, (neither more nor less), the syllogism is *fundamental*, the fundamental syllogisms being (as already stated), ten in number—ten in number, and no more. How many of these can be strengthened? Two. For—

All men are fallible ;

Some men are rational ;

we may write—

All men are fallible ;

All men are rational ;

and the conclusion will be the same; *i.e.*

Some rational beings are fallible.

And for—

Some slaves are not discontented ;

All slaves are wronged ;

Some wronged beings are not discontented ;

we may write—

No slave is discontented ;

All slaves are wronged ;

Some wronged beings are not discontented.

The *fact*, of course, is less true than it was originally: the inference, however, is the same—except that it is deduced *à fortiori*.

And now let us go over the ten fundamental syllogisms again—

I.

All men are fallible ;

All heroes are men ;

All heroes are fallible.

In the first figure. Unsusceptible of variation.

2.

No man is perfect ;

All heroes are men ;

No hero is perfect.

In the first figure. One variation.

3.

*All men are fallible ;
Some rationals are men ;
Some rationals are fallible.*

In the first figure. One variation.

4.

*No man is perfect ;
Some rationals are men ;
Some rationals are not perfect.*

First figure. Two variations.

5.

*All slaves are discontented ;
Some Africans are not discontented ;
Some Africans are not slaves.*

Second figure.

6.

*Some slaves are not discontented ;
All slaves are wronged ;
Some wronged beings are not discontented.*

Third figure.

7.

*No perfect being is a man ;
All heroes are men ;
No hero is perfect.*

Third figure.

8.

*All men are fallible ;
Some men are rational ;
Some rational beings are fallible.*

Third figure.

9.

*No perfect being is a man ;
Some rational beings are men ;
Some rational beings are not perfect.*

Second figure.

10.

*No man is perfect ;
Some men are rational ;
Some rationals are not perfect.*

Third figure.
No. I.

E

Now, although these syllogisms have been exhibited as if the first figure were the original from which the others were derived, we must guard against assuming this to be the exact fact. It is a fact that, just as the first figure can be converted into the second or third, the second or third can (by simply reversing the process) be converted into the first. It is also a fact that, in the first figure the differences of major, middle, and minor are the most decided. Thirdly, it is only the first figure that gives a universal conclusion. Hence, the first figure has been deemed the highest, noblest, and most typical. It may, or may not, be this. The error against which we have to guard ourselves is the notion, which the preceding details have a tendency to engender, that it is the first figure in which we *think*. We rarely think in any figure; nor does the logic of the syllogism pretend that we do. All that the logic of the syllogism asserts is, that when we think in three terms, and those terms give us a conclusion, our thought is reducible to one of the ten forms under notice.

That our thoughts, however, approach certain figures in some cases, and others in others, should be known. It is probable that the sequence,

All heroes are men ;
All men are mortal ;

is commoner than—

All men are mortal ;
All heroes are men ;

That—

Aristides was virtuous ;
Aristides was a pagan ;

is clearly more natural than—

Aristides was virtuous ;
Some pagan was Aristides.

The generality of our expressions may be improved. All that has been hitherto exhibited has been exhibited by means of special and concrete examples. But logic is essentially a formal science. All it requires is, that the conclusion should be true to the premises, no matter whether the premises themselves be true or false. From two true facts we may draw a conclusion which is false; *i.e.*, no conclusion at all; from two false facts we may draw a conclusion that should be unexceptionable. Provided that the reasoning be good, the data may be good, bad, or indifferent. And this distinction is important, inasmuch as it is useful to know in a controversy what part of the argument you object to. That *all swans are black*, is bad zoology. Nevertheless, if we look to the reasoning only, the syllogism—*all swans are black*;

all geese are swans ; all geese are black—is valid. On the contrary, that *some heroes are Europeans* is true, that *some Greeks are heroes* is true also ; and equally true is it that *some Greeks are Europeans* ; the reasoning, however, that *some heroes are Europeans ; some Greeks are heroes ; some Greeks are Europeans*, is no reasoning at all ; nor do the three propositions constitute a syllogism. Though three truths, they are three separate ones, and, to use an old illustration, “like marbles in a bag, they touch each other without sticking together.” Of the two cases before us the first gives bad facts, but good reasoning ; the latter bad reasoning, but good facts.

Such being the case it is clear that in any valid syllogism, it is a perfect matter of indifference what words we adopt for its several terms. We may adopt *any* ; a fact which enables us to give the requisite amount of generality by using letters as symbols. Let Y stand for the middle term, Z for the major, and X for the minor.

The result will then be—

1.

Every Y is Z.
Every X is Y.
Every X is Z.

2.

No Y is Z.
Every X is Y.
No X is Z.

3.

Every Y is Z.
Some X is Y.
Some X is Z.

4.

No Y is Z.
Some X is Y.
Some X is not Z.

5.

Every Z is Y.
Some X is not Y.
Some X is not Z.

6.

Some Y is not Z.
All Y is X.
Some X is not Z.

7.

No Z is Y.

All X is Y.

No X is Z.

8.

Every Y is Z.

Some Y is X.

Some X is Z.

9.

No Z is Y.

Some X is Y.

Some X is not Z.

10.

No Y is Z.

Some Y is not X.

Some X is not Z.

Again, instead of—

Universal affirmative, write A.

Universal negative „ E.

Particular affirmative „ I.

Particular negative „ O.

Doing this, we may say that—

The contradictories are A and O.

The contraries are A and E.

The subcontraries are I and O.

The subalterns A and I.

„ E and O.

We may also say that such a syllogism as the first is A, A, A, in the first figure; such a one as the fifth A, E, E, in the third, and so on.

The memory may be helped. Combinations like A, A, A, A, E, E, and the like are not very easily remembered. Insert, however, consonants between them, and convert them into words. Let *barbara* be the name for syllogism 1:—*celarent* that for syllogism 2, and so on whenever the vowels give the quality and quantity of the several propositions. This is actually done—the names being for,

1. *Barbara*.2. *Celarent*.3. *Darii*.4. *Ferio*.5. *Baroko*.6. *Bokardo*.7. *Cesare*.8. *Datisi*.9. *Festino*.10. *Ferison*.

It would be too much to say that the logic of even the ordinary syllogism ended here. There is much beyond the present details in the ordinary books. But some of this is unessential, some controversial; much historical, much (as has been already suggested) referable to language and the philosophy of classification and definition. Still there is some of it which is truly syllogistic. There are certain fallacies; there are certain compendious and elliptic modes of expression. The main details, however, are the few just given.

The logic just exhibited is the logic of three signs—*all*, *none*, and *some*. By excluding *none* we get a logic of *two*: *all* and *some*. This we arrive at by extending the criticism which applied to the particular to the *universal* negative. Let

No man is perfect,

be written

All men are not perfect;

and a new arrangement is the result. The negative is shifted, and all propositions are affirmative. There is a gain, here, on the side of generality. The details, however, of this have not been worked out.

Another logic of *two* signs is obtained by eliminating *all*, *i.e.*, by making it only a strong form of *some*: so that *none* and *some* (*not none*) are the only signs. What applies to the preceding applies here. For practical purposes *three* signs are convenient; for scientific purposes, they are sufficiently general. But are they not unnecessarily general? Cannot *more than three signs* be introduced with advantage on the side of convenience, and without loss in the way of generality? Lambert admitted the word *same* as a sign. Thus from

Some men are philosophers:

The same are pagans;

we infer,

Some pagans are philosophers.

What, however, if we admit as signs, the numerals 2, 3, 4, 50, and the like? What if we admit terms like *half*, or *more than half*? The syllogism thus formed has been called the numerically definite syllogism.

The details of this may be considered hereafter. The *object* of the present paper is to give the common syllogisms briefly.

ART. V.—SPECIALISTS AND SPECIALITIES.

A LITTLE while ago we were startled from the placid repose of an after-dinner nap by the loud laughter of a friend, one, alas! of too "sensible and nimble lungs." As we opened our eyes widely in blank amazement at the ecstacy of the merriment in which he was indulging, "Listen!" he exclaimed, and for the sake of greater emphasis, he fillied with his fingers the pages of a book he held in his hand. "And pray," we asked, "what work have you laid hold of that so powerfully excites your risibility?" "Oh!" he replied, "this is the new volume of the *Transactions of the Epidemiological Society*. But," he continued, "do not look so ridiculously aghast. It is not the work that is funny in itself; but I have discovered in it a delicious morsel of information. I have stumbled, in fact, over an account of the undoubted prototypes of specialists in physic. Here it is:—

" 'The men who practise medicine,' states a Mr. R. Clarke, writing of native doctors, in a most interesting paper on the Topography and Diseases of the Gold Coast of Africa, 'are ranked with the fetish priests. They do not profess to cure disease in general, but devote their attention to the relief of special ailments. Thus they will, when applied to, say whether they have or have not any skill in the treatment of the particular complaint, or as they express it, 'they have no good medicine for its cure.' The consequence is, that there is a vast number of country doctors, each boasting of his skill in the management of his own speciality. Many of them, however, are mere empirics, and deceive their patients by their tricks. Sick persons travel or are carried great distances into the interior to put themselves under a native doctor having a reputation for curing the particular disease they may at the time suffer. The doctor's fee varies according to the rank of the patient; but it is in general a dollar (4s. 6d. sterling), a fowl, a goat, or a piece of cotton goods, or cutlery,' &c.

"There now, my dear fellow," exclaimed our friend, getting out his words as well as he could amidst a series of half-strangled laughs, "there now, you will perceive that the native physician of the Gold Coast is the very pink of a specialist, and the native physic the perfection of a specialist practice of physic."

"Well," we remarked, with an attempt to maintain an imposing quietude in our voice. "Well, and what follows?"

"Simply this," he responded, "that a specialist doctor is a reversion to an earlier and more degraded type of the doctor;

specialist practice of physic to an earlier and more degraded type of physic."

A self-gratified chuckle formed the period to this remark ; and our friend evidently plumed himself upon having said a good thing.

But "shall quips and sentences, and these paper bullets of the brain awe a man from the career of his humour?" We trow not. Our friend belongs to a class of persons, far too common both in the profession and out, who, if they see an object defaced by any scum or excrescence, are very apt to conclude that the whole thing is bad and impure. Rarely, or never, does it occur to them to ask whether the offensive spume or out-growth may not be the result of some process of depuration, or an accidental matter disfiguring but not injuring the object at the core. They hasten with averted gaze to the other side of the way, or if, prompted by a zealous horror, they seek to eradicate the evil, they blindly strike both at the true and false—the healthy and the vitiated structure.

If, however, we profess to see deeper into the substance of a particular millstone than some other people, it is but just that, in the first place, we should state what aspect the millstone has to those whose less penetrating glance we, in the wealth of our conceit, commiserate.

And here the authors of the *Memoirs of Bilboquet* come to our help with their impudent but sparkling little sketch, "*Paris Médecin*." A chapter of the hero's adventures, freely rendered, is very much to our purpose.

Smith has completed the prescribed course of medical study, and stuffed with pathology, saturated with clinical medicine, and perspiring therapeutics at every pore, he presents himself for his final examination. He passes with neither less nor greater credit than hundreds have done before him ; and seeking out a promising locality for practice, he settles himself there, and having affixed his name and profession in conspicuous characters to the door of his domicile, he resigns himself to visions of happiness and competence, which he fondly hopes to be in store for him. But days and weeks roll on, and the slowly but surely advancing time frets cruelly away piecemeal the hope which had hitherto buoyed the poor fellow up. He feels himself sinking helplessly and hopelessly beneath a sea of difficulties, when one day, as, in search of distraction, he is wandering in the streets, he is accosted by a quondam fellow-student, Brown. Brown at a glance sees how the land lies with his former companion, and compelling him to enter a stylish little brougham, which appertains to the said Brown, drives him off and deposits him where a good dinner and a good gossip may be had at ease.

Suppose the dinner at an end, and that the two friends are irrigating their feelings with generous wine, when Brown, overflowing with worldly wisdom and kindness to his old crony, thus speaks:—

“My dear Smith, I see that you have attempted physic from the wrong side. Nay, more, you are plainly a century behind the time. If I were to visit your residence, I have no doubt I should find in the reception-room an engraving representing Hippocrates refusing the gifts of Artaxerxes, a skull, and an anatomical drawing by Maclise. I am certain that your good nature has led you to prescribe for every form of sickness upon which you have been consulted; it matters not what the malady might be, whether typhoid fever, phthisis, inflammation of the bowels, neuralgia, gastritis, gastro-enteritis, and so forth. Upon this rock you have been wrecked; upon this rock all young physicians are lost. Now, my dear fellow, let me advise you. Give your engraving to the kitchen-maid, sell the Maclise, and throw the skull into the lumber-room. Any way put it out of sight; for, rest assured, it horrifies patients, particularly when women. Convert your reception-room into a boudoir or drawing-room, and hide the practitioner under the man-of-the-world. The best physician, now-a-days, is he who looks least like a physician. Finally, and mark this well, *become a specialist*.

“The physician of our fathers’ days, the encyclopædic physician who grappled with all diseases, is put aside. He is thrust completely into the background, and the public now have faith in specialities and specialists alone. Diseases of the ears, of the eyes, of the nose, of the mouth, and a host of other affections constitute specialities. Each member, each organ of the body has, indeed, its diseases, and consequently its physician, who undertakes to cure them radically; and the physician thus practising, is designated in our new medical phraseology a *specialist*.

“All the specialities are already seized hold of, but that does not prevent new ones being discovered every day. I have discovered a superb one which I have kept back in case of need, but, for the sake of old times, I will give it up to you; it is the SPECIALITY OF THE GREAT TOE.

“Treatment of diseases of the Great Toe! In-growth of the nail, bunions, corns, hard and soft—Jove! what a prospect! This treatment includes maladies so lucrative, that it is needful to pluck it from the hands of the ignorant quacks who now practise it. It is time that true medicine executed justice upon empirics and charlatans, and took possession itself of the patients of pedicures. Do not hesitate; put faith in me; throw yourself at once into this path, and adopt frankly the speciality of the GREAT TOE.”

"But," interposed Smith, "what is your speciality?"

"PINGUIFACTURE," answered Brown.

"And what is that?"

"The art," responded the worthy advocate of specialities, "of fattening people at will; of diffusing the adipose matter, vulgarly called fat, over the body in general, or upon any given point of it—upon the arms, the legs, the breast, the shoulders, in short, wherever it may be wished. Thanks to my speciality, crinoline need no longer be worn, and suffering humanity may be rid of it. But not only have I discovered a means of fattening people, but also of causing them to become lean. My speciality then, as you will see, is a double one, and addresses itself to two very numerous classes—the fat and the lean. I do not lack patients, particularly ladies, because stoutness and leanness are the two plagues of the fair sex. The hour for consultation will quickly be here. You shall go with me and witness for yourself my waiting-room crowded, and the court-yard of my house full of carriages."

Brown had not exaggerated. Smith was fain to admit the success of Pinguifecture. The thick shades of old-fashioned physic, which had so long blinded his eyes, were dissipated, and he became a specialist.

Now straining off the exaggeration of this sketch, we shall find that it represents pretty accurately the feeling of large sections of the public and the profession concerning specialists and specialities. A speciality is looked upon by the individuals composing these sections as the last resort of a needy man, or the resource of a shrewd, bold man to push his way rapidly to competence or public fame. That there have been and are specialists who have become such under the influence of these motives we admit; but that the motives constitute the essence of specialist practice we utterly deny. Specialists of this class are but parasitical growths upon a sound stock, disfiguring and masking its noble proportions in the eyes of the negligent gazer, but, although they may fret it, not a whit detracting from its vitality. True specialists are the chief workers in the advancement of medical science; true specialities are the life's blood of medical theory and practice.

Every medical man of active thought is a specialist. Before he has ended his student-life, before he has entered upon the practice of his profession, he has, either from accident or by choice, fixed his mind more particularly on some one or other of the many questions which are included in the theory and practice of physic. To this question he pins his faith of ultimate fame or success. It may be a puny question of little comparative value, yet it suffices to stir up to greater activity, and keep in action the mental powers

of its pursuer. Think of the dead monotony, of the repulsive stagnancy of that man's mind who emerges from the trammels of student-life, with an average acquaintance with the many subjects which it has been needful for him to study, but with no greater care for any one, or for any part of any one of those subjects than another. Think you that he will, or that he would if he could (unless perchance he possesses the talent of an Alexander von Humboldt), keep himself abreast of the progress of the different branches of science entering into his preliminary studies? The notion is well-nigh absurd. His only hope of salvation from an ever-deepening mental slough is, that the after-cares of practice may rouse him into action in some given direction. If, however, the question pursued be one to tax the utmost powers of the mind, so intimately interlaced are the many branches of science which contribute to a knowledge of the healing art, that we perceive the pre-eminent study of one portion act as a lever to raise the standard of knowledge of all the rest. Such a mode of study, indeed, rightly followed, most fully develops the powers of the mind, and necessitates a more intimate acquaintance with all that bears immediately or remotely upon the subject studied. Thus it is that speciality of study—a true speciality, as we have already stated,—is the life's blood of the theory and practice of physic. It is by many men concentrating their attention on solitary and different points that the advance of medical and of all other sciences is secured, not by all men devoting their attention to every point. What would have been the position of physic had we had to depend for its advancement—for the improvement of our knowledge of diseases of the heart, the lungs, the bowels, the brain, or of any and every part of the frame,—upon the efforts of those who are assumed to study with equal attention any and every form of disease, and not upon those who devote themselves specially to this or that form?

The men who attach themselves to some speciality in the study of the theory or practice of medicine, are the specialists of pure blood; but it by no means follows that the object of that study, its results, and the career of the man should be the same. Apart from the love of study *per se*, one man centres his hopes on the attainment of scientific fame, and looks fondly forward to the time when he may attach F.R.S. to his name: another man, devoted to a speciality which takes him to the bedside, where alone it can be developed, hopes by the honest and hard pursuit of his peculiar study to attain to an honourable competence for himself and family. Is it for the man, however, who seeks for scientific honour above all things, and who too commonly neglects the every-day world about him,

to strike his more provident brother over the face and say, "Thou art less honourable than I"? Surely not. Each has chosen his own course, each has fixed his aim upon a different object, each has fought honourably his fight, each has contributed his mite to the benefit of mankind; but if the gift of the one has rendered more immediate good and brought more tangible returns than that of the other, is it for the less fortunate one in the world's eye to wrap himself up in an abstract and offensive purism, and say, "I am worthier than thou"?

The specialists who rise to eminence in the world's eye, and cull largely of the substantial favours which follow thereupon, constitute a small although glittering item among the true specialists found in the profession. It is only in great towns or the metropolis where the circumstances favourable to the existence of specialist practice are found; but the principle which prompts to the exercise of specialities does not on that account fall abortive to the ground in the country. Specialists both in theory and practice are, happily for the profession, broadcast over the land; and one need only look over the pages of our journals or the lists of medical books to obtain a knowledge of the rich gain to medical science which is perpetually arising from the pursuit of special studies in different branches of the theory and practice of medicine in every district of the kingdom. But in our great towns, and above all in the metropolis, the specialist in practical medicine meets with the combination of circumstances which foster best his peculiar studies and his success. It is there only, and most commonly in the wards of our hospitals, that the opportunities are found for extensive research. And what follows? Years of hard, relentless labour, clinical and literary, until the ear and (in the end) the confidence, of the profession are secured; and these once secured, what again follows? Our specialist's aid in his special branch of study is sought by his fellow medical men; the public very wisely follow suit; a stream of the cases to which he has chiefly given attention sets in upon him; the stream swells by degrees, and in the end predominates largely over all other forms of disease coming under his care; and our specialist stands before the world as a specialist in the most restricted acceptance of the term, but a specialist who has honourably struggled for, and nobly won, his speciality, and whose speciality has equally benefited the profession, the public, and himself. Here, then, we have a criterion of the specialist of true blood—one in whom the confidence both of the profession and the public converge, and thankful we are for our own and for physic's sake that there are several of these men among us.

That there are those who use the rightly acquired fame of the true specialist as a stalking-horse, and seek under its cover to

impose upon the ignorance or the credulity of the public, is not to be wondered at, unless we assume a standard of morality in human nature which the world has not yet seen, nor is likely ever to see. Neither is there matter of marvel that these individuals—of whom we have borrowed a sketch from the *Paris-Médecin*—should in the opinion of many inflict disgrace upon specialist physicians and specialities in the practice of physic. But such a conclusion arises, we submit, entirely from a misapprehension of the subject—a misapprehension which, whenever it exists, leads to this grievous result, that in condemning thoughtlessly, and without due reservation, specialists and specialities in medicine, a blow is struck at one of the most vital points in the development of theoretical and practical physic—a point than which none is more essential to the well-being of medical science.

Such evils as appertain to specialist practice and specialities in medicine may be readily distinguished from the good which belongs to them, and which infinitely outgrows the evil. We do our duty best by depicting the character of the true specialist, and furnishing a criterion of that character. If there be any who think that it is practicable by trenchant means to do away with the tribe of spurious specialists, we shall not quarrel with the thought, but simply hint, lest they should throw efforts away which might be more usefully employed, that *It's a far cry to Utopia*.

ART. VI.—MEDICO-LEGAL STUDIES,

ON THE

PERVERSION OF THE MORAL AND AFFECTIVE FACULTIES IN THE
PRECURSORY PERIOD OF GENERAL PARALYSIS.*

BY A. BRIERRE DE BOISMONT.

(Read before the Institute of France [Academy of Sciences] 24th September, 1860.)

THERE are few phenomena of greater interest to the physician and the moralist, than the change which insanity impresses upon the character, the disposition, and the temperament. It might be said that a magic wand had brought about the metamorphosis, so often does this happen rapidly. That man who was grave, punctual, reserved, economical, and devoted to others, becomes

* Translated from the French:—*Annales d'Hygiène Publique et de Médecine Legale*, Octobre, 1860.

giddy-brained, vacillating, dishonest, wasteful, and an egotist. This man, whose discretion had gained the confidence of all, whose winning manners and happy disposition had been the charm of domestic life, casts to the wind the trust which has been reposed in him, and becomes malignant, brutal, a railer and insolent. Can it be that a little more blood flowing towards the brain, or a more lively excitation of the nervous system, gives rise to these anomalies, and throws up to the surface evil instincts aforesaid hidden, as it would seem, from observation? But are not these elements of causation the same that we invoke to explain acts of heroism, sublime deeds, and creations of genius? Evidently if the elements are similar, they must be modified or combined differently in the two cases. In the arrangement of these modifications rests the enigma of the cause of those pathological lesions of which, up to that point, the effects have been demonstrated; and this enigma is not of a nature to be quickly solved. As to the anatomical lesion that is found so constantly in general paralysis, we cannot attribute to it the moral disorders witnessed in the progress of the disease, since these are observed in other forms of mental alienation which, up to the time when these disorders have become apparent, have not presented any appreciable anatomical change; or if such a change exists, it has no relation to the moral symptoms referred to. Moreover, in paralytic insanity the moral disturbance occurs many years before the malady is suspected.

Insanity manifests every moment the transformations spoken of. They are common in the paroxysms of maniacal excitement which resemble drunkenness; they are observed also in the moral insanity of the English, and in our reasoning manias (*folies raisonnantes*), &c.

We shall study these transformations here solely in relation to paralytic insanity, better known under the name of general paralysis of the insane.

One of the first and most constant of the appreciable indications of intellectual disturbance is the change of character, which consists ordinarily in greater irritability, and in movements characteristic of impatience, anger and violence. If the disposition be naturally of this quality, the characteristics become much more conspicuous, exciting the attention of relatives and friends. This moral perturbation may persist six months, or one, two, or three years, without any concomitant symptoms.

Under other circumstances, the derangement of the mind is announced first by extravagant talk. A clerk, necessarily in contact daily with hundreds of persons whose observation he could not escape, was invited to a wedding. All at once he began to converse in the most extraordinary manner, and exhibited a

mobility of ideas that could not be checked. Sometimes the disorder of the faculties is revealed by acts. A wife, an excellent manager, made purchases out of all proportion to her resources. She despaired, and attempted to kill herself. Shortly afterwards general paralysis became evident. Often we have noted, as the first indication of evil, the menace of suicide.

The change of character may present very varied shades. Four years before the invasion of paralysis, a man who had up to that time been habitually firm, became irresolute, uncertain, and wept readily, although he still managed to conduct his business well for a period of three years. At the end of that time another change came over his disposition; he became irritable, fiery, and choleric. Paralytic insanity succeeded these two metamorphoses.

It is not uncommon to observe, in place of the choleric irritability just mentioned, a placidity or an apathy which results in the individual's being diverted from all serious occupation. We have observed six instances of this kind. The relations, amazed, ceased not to comment and to animadvert upon the grave consequences of this conduct; the patients calmly admitted the soundness of the reasoning, but averred that it was impossible for them to do anything.

These transformations of character lead us to speak of the important facts to which we called attention, thirteen years ago, in the *Gazette Médicale*.^{*} Long before the paralysis appears (we have noted facts extending back from six to seven years), perversions of the moral and affective faculties become manifest among certain individuals, which do not prevent them from fulfilling the duties of social life, and of acquitting themselves of their callings. The families, surprised and distressed, whisper among themselves of acts of indelicacy, improbity, and debauchery for which no antecedent had prepared them. They extenuated the wrongs, they paid the penalties, they stifled their complaints, until this long and secret martyrdom terminated by the breaking out of the disease.

“OBS. I.—A superior official of a great establishment had performed his duties with capacity and zeal almost up to the moment when he was placed under my care. Nevertheless, the details given me by his wife left no doubt that the perversion of his faculties was of long standing. Previously generous and of chaste habits, he had for more than six years manifested sordid avarice and unbridled licentiousness. His wife had ceased to demand from him money for household purposes, because when asked he would become so violent as to cause her to fear mischief. With the progress of his malady, his avarice prompted him to most humiliating acts. He would not pay money due, assert-

^{*} *Quelques Remarques sur la Paralyse générale des Aliénés.* (*Gazette Médicale*, du 22 mai, 1847, p. 381; *Revue Médicale*, 1846.)

ing that he had already paid it; and in the end he had stolen objects from the houses of his acquaintances. Even these last acts were looked upon as eccentricities, no one suspecting the disorder of his mind; and it was not until the life of his wife had been placed in peril by ill-usage that it was resolved to place him in an asylum. There he remained more than five years; his motility at the time of entrance presenting but slight signs of disturbance, but the memory being manifestly enfeebled.

"OBS. II.—Some time after, I was consulted about an individual whose pilferings at a public auction some years before had excited great attention. The observations which I had collected at this time had caused me to think even then that the man was under the influence of the precursory period of general paralysis. I avow that this interview roused my curiosity to the highest degree. I was almost certain that I should find a paralytic lunatic. No information had been given to me. The first words the patient uttered when I entered his room revealed the nature of the affection from which he suffered, and its long standing. The pronunciation was in fact embarrassed, there was manifest incoherence, the physiognomy was, as it were, petrified, and the gait was sluggish. More than eight years had passed since his pilferings had been first noted, and they had never entirely ceased, but it was only a few months before that mental alienation had been recognised. As this patient had lucid intervals and there was no fear of wounding his feelings, (since in cases of this kind the weakening of the intellectual mechanism destroys the susceptibility and renders the patient indifferent to anything), I turned the conversation upon the acts which had led to his arrest. He spoke tranquilly about them and said, 'The men who examined me and placed me in a prison were imbeciles who knew nothing of our profession. It is an usage among us when making an inventory, and this usage is called the *quota G* [*la cote G*] to choose an article, generally of little value, and here are two that I have thus obtained,' he concluded, producing a beautiful meerschaum pipe and a tobacco-pouch embroidered with gold. He then became again incoherent. There could be no doubt respecting the nature of the disease, and I withdrew. A few months afterwards I learned that the general paralysis terminated fatally."

Since the insertion of this note in the *Gazette Médicale* my collection of similar facts has been augmented, and as this subject is not less interesting for the history of the disease as well as for legal medicine, I propose to report several examples taken from one hundred observations collected by myself, and of which the results were communicated to the Medico-Psychological Society.*

"OBS. III.—*Symptoms of general paralysis of fifteen months' duration; malversation of funds seven months after the first indications*

* *Recherches cliniques sur la Paralyse générale (Annales Medico-Psychologique, 1859, p. 294.)*

of disease.—Commencement of legal proceedings.—Progress of the disease.—Death.

"A railway clerk was confided to my care in 1847, to be treated for general paralysis, which had reached an advanced stage. The stammering was marked, there was inequality of the pupils, and feebleness of the inferior extremities, and the gait was vacillating. The memory was weakened, yet the patient conversed rationally, but if he were interrogated upon his health, his position, or his profession, great exaggeration was noted. According to his own account he was perfectly well, gained much money, and performed fully the duties of his situation. After the fashion of many of these patients, he gave no attention to external events; he did not manifest any astonishment that he was placed in an asylum; he ate with avidity, and took no part in that which passed around him. On examining his accounts an abuse of confidence was discovered, and legal proceedings were commenced against him. He was requested in my presence to give an explanation of the malversations he had been guilty of, and to state the use to which he had applied the missing funds; but the only reply which he would give was this: 'That money belonged to me, I earned it by my assiduity in work, and by the improvements which I have introduced into the establishment.' It was in vain that attempts were made to convince him of the falsity of this reasoning; he would repeat imperturbably that the money was his. This opinion will not surprise alienists, because they know that many of these unfortunates have the conviction that they are millionaires, or that everything belongs to them. It was important to ascertain when the first indications of this patient's malady had become manifest. After some trouble I ascertained that fifteen months before, a change in his habits had been observed. Little by little it had been noted that the memory was occasionally defective, that he entertained exaggerated ideas of his position, and that he was affected by a momentary embarrassment in his speech; but as he fulfilled the duties of his place with regularity, these symptoms had not been much heeded. The subtractions had gone on for eight months, but the inquiry concerning them was of necessity abandoned on account of the rapid progress of the general paralysis. The incoherence became complete, he barely responded when addressed, he kept himself erect with difficulty, and he succumbed to the cerebral marasmus after two months' residence in the asylum.

"OBS. IV.—*Licentious acts and unfortunate speculations during a period of about six months.—Intellectual symptoms announcing general paralysis, but no lesion of motility.—Mandate of arrest.—Rapid progress of the disease.—Death three months afterwards.*

"A merchant, aged forty-six years, whose conduct had always been honourable, was brought to my establishment in 1846, on account of acts of licentiousness of which he had been guilty over a period of half a year, and which were so entirely opposed to his usual habits that his family, painfully affected by his conduct, thought that it must be attributed to some mental derangement.

"For several months, moreover, he had given himself up to specula-

tions, of which many had failed. Even at the time when attention had been aroused by his disordered actions, nothing in his discourse and manner of living had excited any suspicion of mental disturbance. He visited the Bourse daily, had numerous communications with persons of his calling, but none of them had perceived his mental state, or, at least, no one had pointed it out.

"When he was brought to me, he neither showed any emotion, nor manifested any astonishment at being transferred to an unknown house. I spoke to him first upon the acts which had led to his being placed under control. He answered, speaking carelessly, and as if the matter did not concern him, 'That alarm had been too readily taken, and that everything would be explained.' I interrogated him afterwards about his business, and the position of his affairs. To these questions, which did not seem to surprise him, he to all appearance responded rationally but somewhat evasively, and gave no explanation. I referred more particularly to certain of the points on which I sought information, and he said, 'My business affairs, like other commercial matters, are both good and bad, I have not to complain of them. My family behaves well to me; my position is satisfactory, and my health is very good.' I attempted to question him more closely, but he then responded, 'I do not know; I cannot call to mind.' Not being able to elicit anything more from him, I terminated the conversation, and he wished me to allow him to visit the Bourse. This request not being acceded to, he left me, as if the refusal were a matter of trifling importance, and went into the garden.

"During this conversation it was evident to me that the attention was enfeebled, the memory confused, and consciousness modified, but I did not observe either embarrassment of speech, disorder in the movements, or manifest incoherence. I concluded, however, that the man was under the influence of general paralysis, and I stated to his relatives that grave consequences were to be apprehended, not only to his life, but also to his fortune.

"The examination of his books was a thunder-stroke. They were badly kept, showed great omissions, and the only certain information to be obtained from them was that ruin was imminent. The commercial position of the unfortunate man presently, however, assumed a more serious cast. The judges of the Tribunal of Commerce pronounced on his affairs a verdict of fraudulent bankruptcy, and directed his arrest; and an officer of the court presented himself at my establishment with the necessary mandate. I conducted him to the patient, in whom, in the space of three weeks, the following changes had taken place. His memory was entirely lost, and he could not respond to any questions put to him. His look was stupid and his figure immobile. Already embarrassment of the speech might be noted, and feebleness of the legs showed positively that he suffered from general paralysis, and that the habitual excitation of his life had been masked by mechanical movement. I declared to the officer that in the state in which the patient then was, I could not permit him to execute the mandate; and I added that from the rapidity with which the affection had proceeded, it was almost certain that a serious termination would very shortly occur. I

prepared a certificate to this effect, and forwarded it to the President of the Tribunal of Commerce, and the arrest was adjourned until the re-establishment of the patient's health. Three months afterwards this patient died in the last degree of brutishness and marasmus."

Disorders of the intelligence, and perversions of the moral and affective faculties may exist long before the appearance of lesions of motility, and even pass unperceived for months or years, because the patient speaks little and conceals his acts.

Obs. V.—*Change of character during a period of two years.—Irregular conduct extending solely over a few months.—Recent extravagant acts.—Bankruptcy.—Judicial inquiry.—Singular answers.—Belief that the individual simulated insanity.—Examinations to ascertain his mental state.—Report proving the disordered state of the mental faculties without lesion of motility.—Sudden occurrence of embarrassed speech and of myriads of transitory ideas.—Paralytic dementia, and rapid progress of the affection.—Death in three months.*

M. Henri, a merchant, aged fifty years, and of good constitution, was brought to my asylum in 1852 for mental disorder, which was said to be of recent date. At the time of his entry the physiognomy announced health, but the gaze was without either fixity or attention. The walk was firm, the attitude erect, and the limbs manifested nothing abnormal. When he was questioned, it was impossible to obtain from him any connected reply: he heard without appearing to comprehend. Seeing an open door, he immediately endeavoured to escape through it, but, on the door being closed, he did not make any observation or complaint, and he expressed no desire to return home.

I thought that the patient was suffering from dementia with general paralysis, but it was impossible to demonstrate the changes constituting the latter affection. The gravity of the case led me to doubt that the mental disturbance was so recent as the relatives believed. I questioned them, and ascertained that an alteration in the patient's character had been observed for two years. He had become incommunicative, answered abruptly the questions put to him, and would not give any explanation of this change of disposition. Very regular in his habits and of exemplary life, he had begun, many months before, to absent himself from home without its being known where he went, and it was not until he had been carefully watched that it was discovered he frequented places of evil resort. His taciturnity was attributed to the state of his business, which was bad. These changes, in fact, dated back to a time when his brother had become bankrupt, and when he himself had in consequence been obliged to close his accounts; but it was only when he had been guilty of sundry extravagances that disease was recognised.

The heavy losses occasioned by these two failures, and the absence of entries in the books, gave rise to most unfavourable surmises, which became still more serious on account of the patient's conduct. When he was requested to give the information required to unravel his affairs, he would respond in a jovial tone—"Very likely: I want nothing, I do nothing now, and I do not wish to do anything; I will see to it pre-

sently. *I do not require anything; all my affairs are in a prosperous state.*" More commonly he said, "*I have done that which is customary in commerce; all will be explained, all justified.*" These brief answers were made without any embarrassment of speech, hesitation, or stammering, but in a mocking manner, and it was thought that he simulated insanity.

This opinion, which did not lack weight, induced me to examine the patient daily with great care. He did not speak to the other boarders, but often played at piquet. After a sojourn of many months, it was noticed that he counted badly, and that he became forgetful, the gait, the limbs, and the tongue still maintaining their normal state. Sometimes it appeared to me that he hesitated in the articulation of certain words, but several months passed without my being able to satisfy myself upon this point. He walked every day many hours with a firm step, then he would sit down in a corner of the hall, reading or seeming to read one book, the leaves of which he rarely turned. When interrogated about what he read, he would answer, "*I know what I read,*" and would not add another word. Twice he had an involuntary evacuation.

As the idea of simulation was still entertained, I was directed to make a report on the case. Founding an opinion upon the enfeeblement of memory, the errors of calculation at piquet, the abandonment of an amusement which had appeared to gratify the patient, the failure of attention, the indifference with which he received his family, his placid air, his singular smile, his promenade in a particular corner of the hall, his incessant reading, the two involuntary evacuations he had had, and the diminution of motility and cutaneous sensibility, I declared that he was attacked with dementia, that general paralysis, which I had expected on his entry into the asylum and in the existence of which I still believed, was not yet manifested by any characteristic signs, but that it was impossible to believe in simulation. The *statu quo* was maintained eighteen months; my opinion was acted upon, but as the physicians who frequently examined the patient on the part of the authorities could not distinguish any embarrassment of speech, trembling in the limbs, or incertitude of gait, and as he appeared to laugh at the questions put to him, confining his answers to the words we have already recorded, and turning his back upon the interrogators when the questioning was prolonged, the opinion of simulation, although shaken, still existed. Some admitted there had been derangement of the mental faculties, but all thought that he knew what he was about.

On the 28th March, 1853, when I made my usual visit, he came to me with a precipitous step, and somewhat uncertain gait, saying that he was very well. I was struck with a very marked embarrassment in his speech, he stuttered at every word. His aspect was stupid, he saluted me at different times after the fashion of a clown in a pantomime, and afterwards drawing me aside, *requested me, in a low voice, to lend him from three to four millions.* Then he returned to his corner and recommenced reading the book he never quitted, and which he most commonly held in the hand with the pages reversed. For five days the stammering was very marked. He *spoke once more of the*

three to four millions, and then his taciturnity and ordinary immobility returned. From this time the disease made rapid progress. M. Henri became more feeble upon his legs, soiled himself, wasted, and in three months succumbed to marasmus."

The case that we shall next record has been observed from the first symptom of disorder even to the fatal termination. It has been possible, consequently, to demonstrate with exactness a primary derangement characterized by exaggerated fears regarding the health, with return to reason for three years. Then a second disorder having the characters of general paralysis, first under the form of ambitious mania, and subsequently under that of paralytic dementia.

OBS. VI.—Exaltation of an hypochondriacal character.—Cure, but with an exaggeration of the habitual disposition remaining.—Appearance of general paralysis at the end of three years.—Death.

M. T——, aged fifty-two years, and of good constitution, had always been irascible, hyperbolic, irritated by the slightest remarks, and could not bear the most trifling discomfort. This disposition is very generally that of his compatriots. For many years he was subject to an eczematous eruption situated on the inner surface of the thighs. He had been advised to use sulphurous lotions. The application cured the cutaneous disease, but he asserted that in consequence of this treatment an intercostal neuralgic affection arose which radiated to the neck and vertebral column. Four months of medication gave him no relief, and he entered a great establishment in Paris. The violence of his lamentations, his paroxysms of anger, and his continual menaces of death, induced the physician who had care of him to recommend him to go into a lunatic asylum. When he came to me he complained of the most intolerable pains. According to his own account, he was tortured, wasting away, lost, and it remained for him but to die. If he were touched, he shrieked as if he were being flayed. After the employment of prolonged baths for a few days he became somewhat better, but as soon as he felt the least return of his disorder, he uttered piercing cries, wept, groaned, rolled upon the ground, and wished to kill himself, but without ever making a real attempt. This patient was the torment of the house. He called for medical aid day and night, and when remonstrated with for his unreasonableness, he answered, "What does your sleep matter? I am dying, and the physician is the property of the patient who is threatened by death."

Little by little this great excitement subsided, and at the end of three months the patient was sufficiently well to take excursions in Paris. During the last six weeks of his stay with me he went frequently to the theatres and into the country with members of my family, and there remained but a more manifest degree of that habit of exaggeration which is peculiar to certain portions of southern countries. M. T—— spoke of his fortune, his acts, his conduct, and his knowledge, with expressions so hyperbolic that we all said, "He is menaced with general paralysis; he will have the mania of millions." He pro-

posed unceasingly operations which would, he asserted, bring him in great sums. A real amelioration had, however, taken place in his state; his neuralgic pains were bearable, he attended to his own interests, and he determined to return home in order to resume his business. When he quitted my care he did not manifest, and he never had manifested, any indication of embarrassment of speech, feebleness of the limbs, diminution of sensibility, or alteration of sight. M. T. was observed most narrowly from the intimate relations which had been established between us.

A year and a half after his departure, he returned to Paris, and called upon me. Apart from his habitual exaggerations, which were a little more marked, he possessed his full intelligence, he executed his business, but in transacting it he displayed an obstinacy which debarred all counsel, and often prevented success. He expended much uselessly; he made purchases heedless of cost, and made expensive gifts. He was not submitted to any examination. For the rest, his conduct manifested nothing of moment, and there were no symptoms of the disorder we feared. One of my sons, some time after, passed a month with him, and he observed solely outbursts of passion and paroxysms of extreme anger on the slightest occasions.

Three years and a half after leaving my establishment, M. T. again came under my care, and for general paralysis. It would seem that the neuralgic pains which had attacked him some years before his first admission, and which had greatly diminished, without ceasing entirely, had now been lost altogether for about a year. This disappearance was followed presently by a total change in M. T.'s character. In place of the obstinacy and anger which habitually characterized him, he had become gentle, but entirely unable to conduct industrial operations. He wished to hear no more of them, and when his children besought him to let them act, and represented to him the losses resulting from his inaction, he replied, "We shall recommence our operations next season. What does it matter that we lose now 50,000 francs, when we shall regain 500,000 in a year?" He saw everywhere prodigious profits, and believed himself to be the possessor of fabulous sums. Presently he committed eccentric acts; he visited the *cafés* dressed in the most singular manner, and set himself up as a good-fellow, speaking to every one. He squandered money as an useless thing. His memory failed, and hesitation and stammering were noticed. The children, who had been forewarned of the nature of the malady, then confided him anew to my charge.

A few days after his arrival, MM. Calmeil and Parchappe saw the case in consultation, and diagnosticated a grave paralytic dementia in an advanced stage, and which would have a rapid course. During the first five or six months he passed with me, he went backwards and forwards, packing his trunks at intervals in order to return home, but abandoning this idea on the first remark. His cutaneous sensibility was very much blunted; he did not move when pinched; he grasped indifferently; but he preserved still his ideas of riches, saying from time to time that he should have a magnificent year, gaining hundreds of thousands of francs—nay, millions. But the activity he had retained was insensibly replaced by apathy; he wavered upon his legs and fell

occasionally. At this time he spoke no more of grandeur and riches but as far off; he passed his days upon a chair, sad, and with a melancholy aspect, saying that he was ill. One day, although the memory was nearly gone, he cried out that he was becoming mad. In the last months of his sojourn in the asylum, he never quitted the corner of the room in which he was placed. His eye was fixed, and without expression; he no longer recognised his relations, or else he confounded one with another, and he responded with difficulty to the questions put to him. The speech was much embarrassed, and there was very marked incoherence. He was led as an infant, and it was with difficulty that he held himself erect. The change which he had undergone was so great, that we thought when he returned to his own home he would succumb in a few months. He lived, however, nearly two years, after having undergone spasmodic contractions, rigidity of the limbs, and wounds and scars which healed and broke out again, and were again healed.

This observation, of which the subject has never been lost sight of, is highly interesting from more than one point of view. First, we can follow step by step the long incubation of the general paralysis to which this unfortunate organization was, so to say, fatally predisposed. A primary derangement of mind, characterized by exaggerated hypochondriacism, announced the approach of the evil. This fact confirms M. Baillarger's opinion upon hypochondriacal delirium considered as a precursory symptom of general paralysis.* A stationary period occurs from the efforts of nature, but it is foreseen that sooner or later the paralysis of millions will be developed; the intellectual rudiments exist, those of motility alone fail. Three years pass in the midst of motiveless outbursts of passion and anger; the patient's affairs are conducted solely under pressure, and they are damaged every moment by false judgments, a capricious will, and acts, which without being stamped with madness, are often hurtful. Fortune may be compromised and often lost in consequence of the determinations arising from a brain placed in similar conditions; but it is necessary to look idly on and to contemplate the event without the power of preventing it, as the law does not permit, in this case, any measure of conservation so long as the individual speaks reasonably. Lastly, the moment comes when the evil is matured and breaks forth. Here we note a phenomenon which has often been observed in cases of a like character—to wit, the neuralgia which had endured several years ceases entirely. Almost at the same moment a radical change takes place in the patient's character, and his disposition becomes different in every respect to that which it had previously been. Although most commonly insanity exaggerates the qualities and defects of an individual, there are cases which prove that occasionally it substitutes a new character for the old one. This phenomenon was followed by the symptoms of paralytic mania in its ambitious form; and this, after existing many months, was succeeded by paralytic dementia, mixed temporarily with a little melancholy depression, in which the patient succumbed after a struggle of more than two years.

* *Académie des Sciences*, 17th September, 1860.

The cases we have recorded do not leave any doubt upon the changes which the character, the disposition, and the habits may undergo from paralytic insanity. In the analysis of our one hundred cases of general paralysis, it is found, when the *third category* is studied, comprehending *disorders of the understanding preceding those of motility*, and numbering forty-two observations, that one of the first and most constant appreciable disorders of the intellect is a change of character which ordinarily consists in a greater degree of irritability, impatient movements, anger, and violence. This was observed in three-fourths of the cases.

In a much more restricted number of individuals the disease was, on the contrary, preceded by a calm, placid, indolent and apathetic state. These individuals reasoned well, and admitted that they ought to work, to act, to attend to business, but between speech and action there was an abyss which they could not leap over. One of the earliest examples that we have noted of this change, was that of the chief gardener of a wealthy mansion. For many years he had done his duties, which were solely of a routine character, well. His activity was great, and sufficed for everything. Gradually he became silent and relaxed his superintendence; he complained of confusion in the head; he still reasoned well, but he confessed that rest would be useful to him. He was placed under my care for two months. In the first he improved; in the second he conversed with great lucidity on his horticultural labours. It was interesting to listen to him, and he appeared to be very wishful to return to his occupation; he indicated, moreover, certain improvements to be effected. We thought that he was completely restored, and he was discharged and immediately returned to his duties. Some time after we had news of him. On his return to the country, it would seem, that he discussed what he had to do, but he was unable to execute anything, or to give any orders; he was always undecided; and it became necessary to dismiss him.

Another example was that of an architect, also confided to our care. M. had a young wife who was very much attached to him. Two years after marriage she perceived that her husband became incommunicative, and that he occupied himself no more with his projects; he promised to look after them, and recommence work, and to go about, but kept to the house. To the representations of his wife he responded that he desired nothing more than to work, but he continued to do nothing, and this state persisted a year. It was observed that he became more irritable and capricious, and that at times he was forgetful. At times, also, he stammered. About this period he was brought to me. He was then in the second stage of general paralysis, the symptoms of which had been clearly apparent for a period of from five to six months.

He became more gentle, but he always remained apathetic. After a sojourn of six months, his family finding him better, removed him home. The stationary condition persisted more than a year, then the disease made rapid progress, and the patient succumbed at the end of two years.

In place of choleric irritability or of a seemingly rational apathy, or with one or the other of these states, graver symptoms may be manifested, such as perversions of the moral and affective faculties. Families are distressed with these changes and do not foresee that they arise from a malady which is very often fatal. In fact, the individuals affected with it continue to perform the duties of social life. Acts of indelicacy, of dishonesty, of debauchery, &c., are noted from time to time, and every effort is made to conceal or make reparation for them; and sometimes the scandal is so great that the law steps in and punishes the unrecognised lunatic.

It is in this precursory period of general paralysis, which may persist during many years, that men who until then were religious, of chaste manners, and honest, are seen to present contrasts the most opposite. Of these abnormal contrarieties, that which has excited the most attention is the mania of robbery, which may be attributed to a disposition of mind very common among general paralytics, and in consequence of which they believe themselves rich, powerful, and masters of all they see. We have cited several examples; let us recall them briefly:—

The Baron de V——, a superior officer in an important administration, where he fulfilled well his functions, exhibited, six years before his entry into my establishment, signs of a notable alteration of his habits of life. Habitually generous, and living in excellent relations with his wife, he manifested sordid avarice, unbridled licentiousness, and ended by pilfering from his friends.

The individual who pilfered at sales, and whose conduct made a great noise at the time, was arrested, and committed to prison. When examined, his defence, which consisted in saying that he had but used a right of his profession, his placidity and carelessness, the slight impression made upon him by the judicial proceedings and the consequences of his acts, and his antecedents, until then irreproachable, led the magistrates to conclude that in his case there was mental derangement. He was compelled to resign his post, and he was confided to the care of his family; but nearly seven years passed before insanity was actually recognised.

The railway clerk who had been guilty of very considerable misuse of funds, when questioned on the subject, no suspicion having been previously entertained that his mind was diseased, said:—"I have only taken what belonged to me; this money was mine; I have gained it by my work and the improvements I

have introduced into the establishment." The reasons by which this opinion was supported, left no doubt on the already advanced derangement of his mind.

The ambitious mania is not the least curious of the phases of general paralysis. It is all the more useful to note this phase, since when present it often happens that the faculties appear to be in their natural state, no one suspecting the perturbation which exists. In the beginning, the exaggeration of self that I have particularly directed attention to, the ambitious mania, does not present itself with those well-defined and grotesque characters, which it possesses subsequently. General paralytics in embryo exhibit an exuberance of contentment and power; they speak, some of places, of dignities, and of honourable distinctions; others of speculations, of transactions, and of purchases to be effected which offer great chances of fortune. These converse of ameliorations, consummations, and discoveries, those of comedies, romances, and books to be published, the merit of which will secure their recompense. These discourses are looked upon as simple manifestations of the desires which never cease to agitate man—no singular phrases, no unaccustomed actions rousing the attention to a more serious consideration of the matter. Or if it should so happen that the personages in question become more lively, more gay, or more enterprising than usual, and deviate somewhat from their ordinary course of life, they are said to be *eccentric*, and there is an end of the matter.

An attempt has been made to circumscribe singularly this insanity of riches, this mania of grandeur, this pride of self, which Bayle had asserted to be one of the characteristic signs of paralysis of the insane, and which reveals too clearly, in its pathological expression, one of the moral wounds of the age. We have sought information upon the exactitude of Bayle's statement, and have already expressed ourselves in these terms.* "On investigating the frequency of ambitious delirium in the forty-two observations contained in the work of M. Calmeil, we have noted twenty-five which offer this type; in the eighty-five observations of Bayle, fifty-two present the symptom of mania of riches or of honours. It may have existed in other cases, because the patients were admitted only when in the third degree of the disease or upon the point of expiring. Let us observe that this delirium ought to be studied during the whole progress of the disease; because some paralytics who at the commencement of the malady have no ideas of grandeur, manifest them subsequently; and so reciprocally. Sometimes these ideas are fugacious, and show themselves as a species of lightning, so to speak. M. Baillarger

* Article, DEMENCE PARALYTIQUE, dans *Bibliothèque du Médecin Practicien (Maladies du Cerveau, &c.)*, t. ix. p. 548.

has made the same remark. In his lectures of 1844* he says: 'It is necessary to watch the individuals during the whole course of the malady; because some persons who at the beginning of the disease have no grandiose ideas, manifest them at a later date, and *vice versa*.' At the sitting of the Academy of Sciences on the 17th September, he stated that he regarded this symptom as one of the principal ones of general paralysis.

"The coincidence of mania of grandeur and of general paralysis," states M. de Crozant, in his report of the patients admitted under the care of M. Voisin in the year 1841, "is a truth which I cannot understand how it has been contested. I certify that there will not be found in Bicêtre a single paralytic (I have at this moment before me the observations made upon these patients) who is not suffering from ambitious mania, provided always that the individual be fittingly examined, and that such replies as that he is neither rich nor powerful be not received as decisive.

"I conducted one day over Bicêtre a physician who applied himself to the study of mental alienation, and who held a contrary opinion, and I desired him to point out to me a solitary paralytic who did not manifest this form of mania. After much research he brought to me a patient, and, with an air of triumph, he asked him before me if he were rich, and a prince; if he were worthy of becoming one, and if he did not hope to become one. The patient responded very properly that he was a tailor, that he barely earned what sufficed for himself and family, and that he had no other desire than that of doing well his duty in his station of life. His entire conversation was very rational, and so far as it went this patient appeared to be an exception. I did not, however, delay to prove to my *confrère* that all this passed for nothing. In fact, when the patient was questioned upon his station in life, and of the manner in which he fulfilled it, we quickly learned that we had to do with the most able, the most distinguished, the most eminent tailor that ever existed—a tailor the most childish and the most superb that could possibly be interrogated. My adversary avowed that he was wrong in this instance. Paralytics carry this self-sufficiency, this presumption, into all that relates to them; their beauty, their health, their muscular force, and their talents are successively vaunted and trumpeted forth among themselves in the most pompous style—a style laden with images and epithets."†

To revert now to our peculiar consideration, the opinion of our *confrère* and friend Bayle. We have analysed one hundred observations which we have collected for the purpose of throwing right upon many controverted points of general paralysis. This is the result of our researches on the point in question:—

* *Gazette des Hôpitaux*, 14th July.

† *Ibid.* 26th April, 1842.

EXPANSIVE FORM.— <i>First Variety</i> .—Mania of riches and of grandeur, predominance and persistence of these ideas.	}	20
<i>Second Variety</i> .—Exaggeration of self-contentment and satisfaction with everything, ideas of riches and grandeur occurring from time to time.	}	22
<i>Third Variety</i> .—Mania of grandeur, or of riches at long intervals, often even as flashes merely.	}	10
<i>Fourth Variety</i> .—Double form, expansive and oppressive, with ideas of riches and grandeur.	}	12
		—
		64
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The symptom noted by Bayle and generalized by Crozant, (without corroborating the opinion of the latter of these practitioners, is not then a frequent phenomenon, since it is noted sixty-four times in our one hundred observations; and it may be conceived that, under the influence of this idea, paralytics would carry off things which did not belong to them.

These thoughts of riches, of power, of talent, of capacity for everything, have often the most deplorable consequences for general paralytics. This morbid state, and the intellectual debility which is the consequence of it, leaves these unfortunates at the mercy of designing men, who lead their dupes into disastrous transactions, to the great injury of the victims and their families.

Several years ago, I was consulted about a rich man in whom I quickly recognised the intellectual dispositions spoken of, although he dissimulated very well his infirmity. He was one of those patients who impose upon those around them by their apparent rationality, their specious arguments, and the observation of the habitual proprieties of life. The substratum of vanity which I readily discovered, in spite of his rational address, induced me to intimate the peril he was in to his family. I could not advise them to place the patient in an asylum, indeed they would not have followed such advice, he as yet speaking so well; but, in presence of his physician, a well-informed man, I advised the family to keep upon their guard relative to his fortune. "Take precautions," I said, "against sharpers; they would easily victimise him. The danger is great on his side, and I warn you of it, because I have seen more than one example of this kind." A year passed before I heard anything more of this gentleman. Then, one day, he was brought to me, after a scene of violence which had placed one of his relatives in danger. My prediction was verified; it was necessary to make good a deficiency of 200,000 francs.

The merchant whose case is related in the sixth observation

had also in the same manner squandered 600,000 francs, and reduced his wife and children to poverty. At the termination of the sitting of the Academy of Sciences, where I had communicated this paper, one of my friends said to me, "If these facts had been known, my son-in-law would not have lost 800,000 francs, ruined my daughter, and left five children to my charge!"

It is impossible for the thoughtful physician not to remark that the mania for gold which has descended among the lowest classes of society, whilst previously it was restrained to patricians and freed-men, to the higher classes and their attendants, has become incarnated in a special madness which gives to our asylums one-fifth, one-fourth, sometimes even one-third of their inhabitants. The number of those struck by it is to be counted by thousands, and is constantly increasing. It has been pretended, as in other facts of a similar character, that this augmentation depends upon a better knowledge of the malady. We shall make but one observation upon this objection, namely—that thirty years ago there were in our private asylums more demented patients and fewer deaths, while now dementia has yielded the precedence to general paralysis, and at the same time the mortality has increased. For the rest, among the authors who have quoted facts in support of the predominance of this malady, we ought not to forget M. Moreau de Tours. Comparing the reports of Bicêtre, Charenton, and the private establishment of Esquirol, the *résumé* of those three asylums may be summed up thus:—

First asylum, considerable increase of the number of general paralytics for the inferior classes; *second asylum*, less sensible increase for the middle classes; *third and last asylum*, stationary condition for the superior classes.* Strange contrast! this gold, after which the most of these unfortunates have run without obtaining it, they now possess at the end in a dream! They have an abundance of it; they dispose of millions upon millions, their treasury is inexhaustible; under their happy hands everything is changed into gold and precious stones. They are princes, kings, emperors, gods! I remember a poor grocer whose business transactions were bounded to the sale of sugar, pepper, and cinnamon; he believed that he associated with all the intelligences of the age. Laced with a species of Swiss banderolle, he styled himself governor-general of the universe; distributed on all hands orders upon the Bank of France; and directed that several hundreds of millions of his works should be printed. The Emperor of China, he asserted, had read his books, and commanded that a translation should be made of them!

As if it were in bitter mockery of their lot, these Cræsus, these

* *Gazette Médicale*, 4th trimestre, 1850.

princes, these geniuses, these all-powerful men, are stricken with debility so great, that even when in the prime of life, a child can push them over. Their speech is interrupted momentarily by a stutter which prevents them completing a sentence; their feeble hands tremble as they take hold of an object; their legs can barely sustain them, and in the end fail altogether; and the last stage of their malady is a brutishness unknown among animals.

The forerunners of general paralysis do not develope alone the disposition to pilfer, they also produce changes of conduct which cause the greatest astonishment among those who witness them. To the examples already related, we may add the following:—A magistrate of irreproachable manners up to the age of fifty-two years, presented at this epoch a change in his character and habits which surprised his wife and friends. From being cheerful, affectionate, and reserved, he became moody, churlish, and communicative. It was noticed that he drank, and that his reason was at times deranged. Attention was also aroused by the fact that he frequently left the house, and sought to hide whither he was going. He was watched, and it was discovered, in spite of his precautions, that he frequented houses of ill-fame. Conduct so opposed to his principles and entire life, excited the supposition that his mind was disordered, a notion which, until then, had not occurred to any one. A specialist physician was invited to dinner, the family fearing to wound the feelings of the patient by a direct visit. The play of the physiognomy was still preserved, but during the repast the physician noted occasional forgetfulness, signs of inattention, certain ambitious conceptions, a slight hesitation, and inequality of the pupils. His opinion was soon formed, and from some movements of impatience which escaped the patient, he cautioned the friends to be on their guard, as it was presumable that paralysis was in progress. A few days afterwards, great excitement rendered it necessary that the patient should be placed in an asylum.

It is evident, then, that insanity, and particularly general paralysis, can change the character of individuals, and give rise to eccentric, bad, and reprehensible acts, in opposition to their known habits. But at this point a difficulty occurs: how shall we distinguish whether these acts arise from perversity of the passions, or from disease? It has been unhappily shown by experience, that men who have acquired a reputation without stain, may, under the influence of violent emotion, give the lie to their antecedents, and commit an evil action (it is requisite to mention this, although we shall not dwell upon the subject); but it very often happens that these sudden and unforeseen lapses are the result of a mental disease. Now, in cases of this kind there are frequently precursory symptoms, *avant-couriers*, as a celebrated

English alienist physician, Dr. Forbes Winslow, has well said, in his remarkable work *On Obscure Diseases of the Brain and Disorders of the Mind*. It is these precursory symptoms which it is necessary to seek for and place in evidence. In very many cases an examination readily lays bare the mischief, and the practised physician promptly demonstrates facts which the affection of the family had misunderstood, palliated, and sought to explain. Nothing is more common, indeed, in such circumstances, than to hear relatives exclaim, "We had not noticed these things; we did not attach any importance to them; or we looked upon these actions as eccentricities, the consequence of trouble. The idea of insanity never entered our thoughts." Others will say: "Now that we think of the matter, these particulars to which you have called our attention have existed a long time." Some will add, "We mourned over his conduct, we could not comprehend it, we attributed it to the time of life, to sickness," &c.

But there are cases which take us unawares, and for which we are in nowise prepared. Under these circumstances it is requisite that the physician should be doubly careful in his researches. The index which ought to guide him in the first place is the idea of disease. In the majority of these cases, in fact, where these transformations of character, disposition, and conduct are noted, it is right to suspect general paralysis; if the age be from thirty-five to forty-five years, if there be sensual and intellectual excesses, and hereditary transmission is probable, the presumption acquires more force. But there are much more certain marks, those, to wit, furnished by disorders of the three most important functions—intelligence, motility, and sensibility. General paralysis may manifest itself by lesion of motion; it may show itself first by changes both of the intelligence and the motility combined; or it may be heralded by derangement of the understanding alone.

Before examining the characteristic symptoms of these diverse lesions, it is necessary not to lose sight of an initial phenomenon, which, although it does not possess the character of universality which Bayle attributed to it, is frequently observed, and merits consideration: I allude to congestion. In our one hundred observations it has been noted sixty times. This casualty may consist in simple giddiness, or in vertigo; it may even pass unnoticed, but most commonly it is recognised, and it is followed by grave results of a special nature. The congestion determines an enfeeblement of the intellectual powers, and occasions forgetfulness, loss of memory, and indecisions. The attention, the comparison, and the judgment lose their clearness, their precision, and their ordinary stability. If the individual be required to give a *résumé* of a transaction or to express in writing

his opinion upon a disputed subject which demands thought, marked differences will be observed between the work in hand and the ordinary efforts of the person of a similar character; sometimes the writing itself will be altered. When the disease has made progress, omissions will be observed, as well as the forgetfulness of words or letters. Kindliness is often more marked than usual, and the patient enters into conversation with a confidence which at a later date will become ambitious mania. At other times, on the contrary, but more rarely, a state of sadness is observed, a tendency to melancholy or hypochondriacism. However little tact the examiner may possess, the patient expresses no astonishment that a stranger should mix himself up in his affairs.

The disorders of the muscular system are the touchstone of the disease, and often even they suffice alone to reveal the existence of general paralysis. One symptom especially may be considered as the starting-point of the series of degenerations that the patient passes through. This symptom, characteristic to the specialist physician, and which escaped but a little while back the attention of able observers, manifests itself by a passing trembling of the lip, and a slight and hardly perceptible embarrassment of the tongue, a hesitation upon one letter or word, which recurs only at long intervals. No doubt this symptom alone would not be sufficient for the diagnosis of general paralysis, but it weighs heavily in the balance; it appeals strongly to the attention, and when it is joined with other well-known symptoms, there can be no doubt. This muscular enfeeblement, in truth, extends itself over the whole system: the figure has no longer any expression, because the muscles which respond to the workings of the mind contract with difficulty, or not at all; the gait loses its ordinary erectness, and the movements lose their precision, and the pupils become unequal. A certain number of these patients recognise that they are no longer apt for the sexual functions; others, on the contrary, abandon themselves to excesses of every kind. In order to ascertain if the diminution of motility be widely distributed, require the patient to grasp the hand, and it will be felt that in many the pressure is not in relation with their apparent strength.

The sensibility may present an appreciable change. M. de Crozant has remarked this fact as existing at the beginning of general paralysis. It has been doubted, but we have confirmed it in a case of commencing paralysis seen in consultation with MM. Ferrus, Baillarger, Brochin and Carrière. Anæsthesia has been met with many times in insanity on careful examination. It is common in the second and third stage of the disease. For a long time we have experimented on our paralytics, and in

nearly every case we have noted diminution of cutaneous sensibility ; in some instances, indeed, there was complete loss. It is necessary also to ascertain the composition of the urine, and, by the aid of electricity, the contractility of the muscular system. Finally, in several cases we have seen amaurosis, transitory deafness, and paralysis of the sixth pair of nerves, precede several years the development of general paralysis, of which a diagnosis had been made from this epoch.

In summing up the cases recorded in this article, and the remarks to which they have led, we think that we are justified in concluding :—

1. That when individuals, at a period of life already advanced, exhibit a change of character and of conduct, and commit actions which are in complete disaccord with their principles and antecedents, we ought to surmise a perversion of their intellectual faculties.

2. This surmise becomes a certainty when there is discovered among the majority of them several of the characteristic symptoms which we have enumerated.

3. The doubt which might arise in a less-marked stage of the malady, is dissipated by prolonged observation, since ninety-five per cent. of the cases of general paralysis tend to a continual progression, and the disorder terminates by death in about the same proportion of instances.

4. Lastly, the symptoms described possess a substantial importance, because they place us upon the traces of general paralysis before the disease is yet fully declared.

ART. VII.—THE WEAR AND TEAR OF MEDICAL LIFE.

AN Indian officer who has travelled over a large portion of the habitable globe, remarked the other day, that in whatever quarter of the world you may happen to alight, there you are certain to meet with a British medical man. In the remote islands of the Indian Archipelago, as well as in the backwoods of the Far West, an English doctor never fails to present himself ! They are, happily for the human race, spread like a fan all over the earth. The smallest colony has often more than one. In the most unfrequented localities you find an English physician or surgeon settled as a permanent resident. Ask in the hour of difficulty and danger for a doctor, and, *sesame !* a son of Great Britain stands by your side ! How is this ? What inducement can

have led the adventurous student, or the experienced practitioner, to migrate so far from his native land? What a history of individual chances, hopes, fears, shame, or necessity, must it not be that can have driven or seduced the well-educated, if not the well-connected and ambitious aspirant, from the grand arena of the social world, where merit is rightly rewarded, wealth procured, and a name achieved! What destiny has provided for the numberless outcasts of mankind, "remote from consequence, and unknown to fame," to be thus skilfully cared for in the season of sickness, the day of calamity, and the hour of death? What a boon, and how little dreamed of in this huge metropolis, overwrought with the business of life, and merged in the vortex of headlong egotism or inexorable toil!

But it is part of the nature of the Saxon race to migrate from their home. It belongs to that peculiar spirit which rules the progress of our "Ocean Isle," to look beyond its shores, and to wend its way to the most distant climes, never more to return, perchance, to the spot from which it sprang. Of the numbers who pass their examinations weekly at the several medical boards, how few, comparatively speaking, ever settle down to practise in their native land! The greater number are never heard of again from the hour in which they obtain their diplomas to that in which their names are inserted in the obituary of some local or more widely circulated newspaper. Perhaps even this last mark of respect is denied them; and they finish their days in some distant clime alone, unknown, and unregretted even by those with whom they started in the morning of their prime. Premature disease, contracted, perhaps, during the period of their studies, cuts off not a few; the ocean or the desert swallows up others; disappointment and the icy hand of penury and want stifle many a fine genius and worthy soul; while the army, navy, and the mercantile marine might tell the twice-told tale of all the rest. A remnant remains at home. Of this remnant, alas! but a small section surmounts the stern obstacles raised up against their strenuous efforts at advancement; and, out of the whole number, a few—a very few—survive to gain a satisfactory competence, or to rise to distinction in their profession.

Do you see yonder lean man, grey-headed and intelligent, walking down St. James's-street, clad in rusty black, and gazing at you with his cold, grey eye, as you quickly pass him by? Ambition, fatal ambition, marked him for her own. He came from a provincial town where he was well known, and, with every legitimate diploma in his pocket, duly signed, sealed, and delivered by the examining authorities, started in the great race to compete the prize among the millions of the modern Babylon. Ah, foolish effort! "Dark was his morn of life, and bleak the

spring." The great world passed him by, and heeded not the talents buttoned up within his vest, nor heard the cry of his young ones pining away in a large house in a fashionable quarter of the town. He has grown grey in quest of a reputation perpetually fleeing from his sight, and eluding his tremulous grasp.

In the back room of a paltry lodging, in the deserted street of a fashionable watering-place, stretched on a water-bed, palsied and dying, lies one who not long ago resided in London, sat in professional state to receive the numerous patients that beset him daily, or rolled along the streets in his chariot to keep his appointments with due propriety and punctuality. How jaunty was he then ! How little did he foresee the inroads that would be made upon the slender texture of his nerves by the constant excitement of the mind, the broken nights, the anxious days, and the precarious tenure of maintaining professional infallibility at the top of its bent. And then he wrote a book. The book sold, and extended his reputation, and added to his toil. He wrote a second, and the second sold as well as the first. He was at the acme of his hopes. A London celebrity was before him, when, lo ! his eyesight failed in the zenith of his years, and he withdrew to linger out his term on a small pittance in blind obscurity. Adversity has no friends. The crowd that had hung attentive on his lips, forgot that he had ever existed, and passed on to the adulation of their next new idol.

And this aged gentleman, grey headed and shabby genteel, with wisdom on his brow and discretion in his gait—how is it that this venerable epitome of medicine has never plucked a leaf from the golden bough of fame, nor taught the public to credit what he really is—an able, a learned, and a useful man ? But such are the chances of the medical life. The pretender too often carries the day ; and loud assertion and bombast prevail over solid merit, modesty, and truth.

The pursuit of medicine, however, is not to be blamed for casualties such as these. Most likely they are the lot of humanity, and belong to that class of severe teaching to which we, as moral beings, are subjected in the pilgrimage of life. Success is a rare result. The most gifted are not always the most successful. It belongs to a happy combination of things, over which we have no control, to be able to bring forward and produce before the world, in their proper light, those high qualities with which we have been endowed, and to offer them for general service in the most agreeable and acceptable manner. The kindest of patrons can do little or nothing for us, unless we can do much for ourselves ; and the most fortunate concurrence of events is fruitless

without moderation, sagacity, and the consummate perception of time, circumstance, and place.*

In the routine of life, the practice of medicine affords a subsistence to about thirty thousand medical men in this country. Perhaps the average incomes of the whole taken together range from 500*l.* to 700*l.* a year. The majority are general practitioners; a class of men endued with a comprehensive and strictly practical education. The health and safety of the million are in their keeping. The sanitary management of private families is regulated by them. The unions, the workhouses, the provincial dispensaries, and hospitals, are officered by them. By them, the poor are waited on in their own dwellings; and a vast amount of disease is attended, alleviated, or cured, by their unpaid, if not unrewarded ministrations. The public are scarcely alive to the fact of how much the health of the community at large is in their hands, and how conscientiously and ably they discharge their duties. By night and by day, in summer and winter, the general practitioner beats his rounds, till the very stones might prate of his whereabouts. Such a man is always useful, and invariably in demand. His judgment acquires ease and perspicuity from incessant experience; his manners become chastened and toned down by the sight of suffering, in which he is deeply concerned; and he has no time to play the pedant, or to affect the ostentation and folly of the age. His behaviour assumes an air of gravity, and his countenance expresses that moral grandeur which is the result of a mind engaged in the slow prosecution of truth, the steady and daily exercise of benevolence. He becomes, generally, prematurely old. His task never ceases. He seldom indulges in a holiday, either at home or abroad. Each day brings its duties, which cannot be omitted without detriment to himself or others; and, above all, the labour of every day must pay for its own expenses. As to his realizing a fortune, it is out of the question. He may save enough to keep the wolf from the door in his old age, if he live to be old; or for his family, if, as is often the case, he die early. He may catch a fever, and die; or fall into ill-health from constantly breathing the contaminated air of sick rooms and hospitals; or, in fine, he may be worn out in spite of the strongest constitution. But as to his acquiring a fortune, in the sense in which a railway contractor, or a successful stockbroker, merchant, or lawyer makes one, and counts his hundreds of thousands of pounds sterling, and maintains a London establishment and a

* Tacitus says of Petronius, the charming and well-known author of the best and the worst of satires, that, what others accomplished with trouble and hard work, he achieved with indolence and a masterly inaction.—*Annals*, xvi. 18.

country-house, and procures a commission in the army for his son, or sends him to college, and introduces his blooming daughters among the aristocracy of the land—why, fortune, in this sense of the word, is, as far as the medical man is concerned, simply ridiculous, and signifies nothing. The successful speculator never works for nothing; his prosperity is the produce of his turning everything to profit. He never deals with the poor, of whom he has no practical knowledge. He does not believe in poverty. He looks upon it as a disgrace to be poor.

Follow the medical man through yonder dismal alley, climb the creaking stairs after him, enter the dark, dirty, unfurnished room, and attend him to the bedside of that poor woman sinking from disease, and who repays him with nothing better than her prayers. Depend upon it, those prayers are written in the Book of Life, and will, on the great day of account, outshine the glitter of the luckiest millionaire upon earth. The doctor's pay is frequently nothing more substantial than a prayer; and, then, if you return home with him, you will see how modestly he is forced to live, and how hard he works in order that he may live at all.

By himself, the general practitioner cannot possibly earn more than 1500*l.* or 2000*l.* a year. With a partner, of course, it may be doubled; but by himself with a few rare exceptions, 1500*l.* a year is, perhaps, the maximum he earns. For, it must be borne in mind, that there are not more than a certain number of hours in the night and day, and a certain portion of time must be allotted to sleep and refreshment. There remain, then, not more than twelve hours for incessant occupation, and this is a much longer space of time than can be endured, or persisted in by those whose constitutions are delicate, and minds sensitive. It is not possible, therefore, to visit more than a limited number of patients every day; and considering that patients generally reside far apart from each other, and cannot be dismissed in less than a quarter or half an hour each, if the case be serious, it follows, that allowing for the distance of ground to be travelled over between house and house, not more than three patients on an average can be seen in the hour, or thirty-six patients a day. In unhealthy seasons, he may count as many as fifty on his list; but, in general, not more than thirty. Of this thirty, one-third pay

* A short period previously to the late Dr. Todd's death, I had the pleasure of meeting him at the dinner-table of a mutual friend. One of the subjects of conversation, after the ladies had retired, was the number of patients a London physician engaged in active practice could see *per hour*. Several eminent physicians present took a part in the conversation. It appeared to be the general opinion that allowing for distances, &c., *four* was the *maximum* that a physician could

nothing; and the rest pay more or less according to their means; but even at its highest estimate, this will seldom produce more than 2000*l.* per annum, subject to a heavy set off on the score of business expenses. And recollect, that, to realize this sum, there must be no suspension of labour. It must be *de die in diem*—one and the same from the first of January to the thirty-first of December. Few constitutions are equal to this prolonged exertion. The health sooner or later gives way. Very few persist in carrying on so extensive a practice for many years in succession. They are forced to withdraw from it; and fortunate indeed, if, in so doing, they have something of their own to fall back upon. If not, they must go manfully forwards, and die in harness.

There are numerous instances of medical men, living on to a green old age, and cheerfully continuing the practice of their profession to the last. They have realized sufficient to enable them to keep their ground, and, when occasion requires it, to take things easily. But each healthy old man, who has weathered the storm, represents how many who have been wrecked, stranded, or gone adrift?

For the most part, young medical men commit a great mistake on first starting. They overhouse themselves. Their establishment eats them up. They have not the courage to live in a small way. Then they marry too early. It is a virtue on their part, and speaks volumes in their favour. But house expenses are certain, and professional returns uncertain. Children must be fed: servants must be paid. The wife likes the habits of a lady, decorates her rooms, and receives her friends, while her husband lives in the streets, that he may sleep in a mansion. For a mansion it is to him, that vast pile of bricks and mortar, for which he pays an enormous rental, and which he has furnished beyond his need. For the sweets of life are unknown to him. He toils only for his daily bread. He has no time for visiting. He can never receive properly. His occupations unfit him for doing so. His real post, and the one in which he shines, are the sick chamber of the wealthy and the hovels of the poor. Beyond their precincts, he is nobody. How can it be otherwise? If he is a man of fashion, he is unfit for his profession; or, if he be a philosopher, he is unfit for fashion. Add to these eccentricities and burdens, an equipage—a shining, well-turned-out equipage! This is the climax of folly that has brought many a general practitioner to the ground. It is time enough to ride in

visit and prescribe for in the time specified. Poor Dr. Todd came in late to the dinner, looking extremely haggard, and evidently much depressed by over work. Death appeared even then to have him in his relentless grip. The candle of life had apparently burnt to the socket.—ED.

a carriage when you have realized capital, or should be lucky enough to possess some private means of your own. Only, private means alters the question, which, as we are now looking at it, is one of pure, unaided, professional ability.

It has often occurred to us, that most medical men would be the better if they remained single. We know that it is opposed to the received opinion on the subject, and we own that it has its inconveniences. But we feel confident that, in the present state of society, in which expensive luxury forms a constant element, it is next to impossible for a general practitioner to support a proper appearance in the world from nothing more than the proceeds of his professional exertions. It is the married life that urges so many to work themselves to death. They cannot bear to see their family less than they should be. Consequently they are ever on the fret. They have no leisure to sit down and think. They cannot and must not do so; and it is owing to the cares of matrimony that many, who would otherwise have been philosophers, devoted to their profession, end by becoming nothing better than routineers or professional tradesmen. In moments of real illness and danger, the public do not ask whether the doctor rides or walks, is married or unmarried. All they require is that he should be at hand when he is wanted, and should be capable of performing all that is required of him.

There is something transcendently noble in the practice of medicine. Gold and silver are not to be compared with it, neither are they its proper reward. It is humanity in the highest meaning of the term—practical charity, which, we are assured covers a multitude of sins, "I was sick and thou visitedst me:" here is thy reward, not in this life, but the next.

A youth is dazzled by his first sight of the medical world. He sees a carriage driving by, the speed of the horses overcome with toil, and the brow of a distinguished surgeon or physician peering through the window. It is a recently created medical baronet. He is hastening to an important consultation at that great house within those portals at the corner of that street. Every one knows that its illustrious owner is at the point of death. The distinguished son of Esculapius dashes through the entry; the liveried servants receive him at the principal entrance. He crosses the marble hall, ascends the broad staircase, and enters the sick chamber. The family medical attendant is already there. The patient moans from within his canopied couch. The apartment is richly carpeted; the hangings are damask; the furniture is *en suite*, and the lofty windows are shaded by appropriate draperies. The consultation is long; the opinion grave; the fee large. The whole scene bears the impress of the grand and the imposing. It is the great world in its richest attire,

convulsed in one of its saddest moments. The little moments drop away, like the sands in the hour-glass, and the great man dies. The emblazoned epitaph on his ancestral tomb in the distant village church sets forth his name and lineage, "to whom related and by whom begot."

The next year the distinguished physician dies also, from over-work;* and is gathered not unto his fathers, but is deposited in a vault, newly excavated in the midst of strange graves, in a newly planned joint-stock cemetery. The youth does not see the issue of events, or will not see them. He only sees, in his mind's eye, the dashing carriage and the happy face within it. And certainly it is a vision never to be forgotten. Silently he breathes a fervent wish that he may live to be the same, although his favourite poet might have warned him that every scheme of happiness ends only in disappointment, as every form of life terminates only in death.†

The pageant of the world is but a dream. It moves forward in procession to a slow and stately measure, while first one and then another figure is snatched from its ranks, which are always changing, but are never changed. The phantoms keep coming and going, but the scene remains.

The English physician, both of former and recent days, has always played a prominent part in the history of medicine. He is classed among the aristocracy. Individually, he is recognised as a gentleman. His mode of education and style of thought entitle him, in a certain sense, to the homage of his brethren, and of being looked up to as a person the most proper to be consulted in cases of difficulty and danger in the last resort. All, indeed, do not succeed equally well in this respect. Many fail. The common difficulties of living beset them as well as others. A thousand trifles may be wanting to accredit the most accomplished among them to the countenance of public esteem. People are fastidious. They pick and choose as best it suits their fancy. They please themselves, they care not how, and they know not why. They are sometimes wrong, and then they resent it upon others instead of upon themselves. But, upon the whole, the *vox populi* is right in the end; and the most deserving have seldom failed of their reward.

But the fortunate candidate for public favour is just as often the victim of success as he would have been of failure. The

* WORKED TO DEATH.—The carriage of the most famous physician in Dublin was waiting on Saturday last to take him on his rounds, when a strange visitor intercepted him on the way. One touch from his dart on a little cerebral vessel, and our obituary records the sudden death of Sir Henry Marsh from an apoplectic seizure.—*Lancet*, December 8th, 1860.

† The infinity of lives conducts but to death, and the infinity of wishes but to disappointment.—*Moore's Life of Byron*. Murray, 1860, p. 475.

demand upon his intellect is stupendous. It is enough to crush the strongest head, and break the stoutest heart. For he who leads must necessarily know all that is known by those whom he leads. Nay, he ought to know more than they do ; for how can he advise them if he knows less? The infinite particulars of science are progressively on the increase. The particulars of yesterday are obsolete to-day, and those of to-day will be obsolete to-morrow. The leading physician must know them all. There is no use in pretending to know them. His knowledge must be absolute, and of the latest date. The feint would be detected at the first touch. It follows therefore, that he must not only be an active practitioner, but a scholar and a student besides. What an exhaustive effort! What a gigantic struggle! At home, he must study and think hard ; and he no sooner steps across his threshold, than he must travel *express* all over London, and from one end of the kingdom to the other. There is no time, when he can say, Hold, enough! There is no *sick-call* that he can refuse. He can never say, No! for the first refusal from caprice or fatigue marks the summit of his reputation, and sounds the note of his decline.

Add to all this, he must sustain the character of his profession by his pen, whenever occasion calls for his doing so ; and he must sustain it honourably, ably, and critically. It is expected of him that he should give to the world the fruits of his experience in the shape of a goodly volume. Most likely he lectures once or twice a week, and visits the hospital of which he is one of the staff. His day is occupied from morning till night ; his hours are frequently interrupted by the calls of friendship and humanity ; and society requires that he should be well versed in the political exigencies of his professional brethren, and ready to step forward and maintain their cause in the public arena of the world.

His life is a struggle against mighty odds. Ceaseless anxiety is counterbalanced by restricted pecuniary results. "Every guinea involves personal service, and every prescription is a spreading out of brains upon paper."* His life is intensified to the last degree, and consumes itself with amazing velocity. His high repute and well-earned fame weigh with a deadly pressure on his frame. Many sink under it, many more perish in the vain attempt to raise it. All aspire to it. A few sustain it.

In the character of the physician we include that of the surgeon also ; for though he does not profess to be so liberally educated as the physician, yet there is no reason why he should not be so, and in fact many are. In practice he is not a whit less zealous and trustworthy than his colleague. The one solicits

* *Lancet*, December 8th, 1860.

the same public confidence, and shares the same favour, if not the same honours, as the other. In professional credit they are equals. They discharge different functions, but their object is the same.

There are few sciences in which the one and the other have not shone. There is no occasion of pestilence or national calamity in which they have failed in their duty. They are spoken of as well in the colonies as within the limits of the United Kingdom. The exceptions in which they have betrayed their trust, and tarnished the lustre of their name, are so few, that they establish the rule. Their heroism is unquestioned. They have faced the thunders of a naval engagement, or the field of battle, the trenches, and the siege; and have merited by their personal bravery the same badge of distinction as that which decorates the breasts of those by whose sides they have fought and bled.

Such men deserve much, and their pay ought to be in proportion to their talents and devotion. But is it so?

The incomes of fashionable practitioners are quoted at fabulous rates. The vulgar ear delights in marvels. It is taken for granted that they sweep the board. But so far is this from being the case, that, setting aside private fortunes with which we have no concern, the most esteemed men have come into notice late in life, and reached their professional climax in the decline of age. At the age of fifty, the late Dr. Bright was still a candidate for popular favour. And, then, as to the incomes that are made. As with the general practitioner, so with the physician, he cannot make the day longer than it is, nor pretend to more endurance than the rest of mortals. If he sees twenty patients at home in the morning, and thirty after he goes out, it is as much as he can manage, and about the same as that of his inferior medical brother whom he meets in consultation. Nor do all these fifty leave a guinea a piece behind them: some leave none: others leave more; and if the fee for a distant visit into the provinces be large, it is barely more than a compensation for business missed or lost at home, to say nothing of the bodily fatigue undergone in a long and hasty journey, and the responsibility incurred by delivering judgment on a case from which there ought to be no appeal. *Five thousand pounds* a year, or *three thousand pounds* at least, is not more than is requisite to maintain a first-rate London establishment in necessary working order for an extensive consulting practice. Doubtless, much larger incomes than this are made; but we ask, how many surgeons and physicians of note are making as much as this, or as little?

The most painful portion in the history of a physician's life

are the early years of his commencement, which are passed out of sight, and in straitened circumstances. The bitterness of this period darkens the spirits, and throws a deep shadow across the brightest futurity.

Can civilization proceed at its present speed and intensity? Can life subsist under it? Will it not eventually wear itself out? We think not. Facts declare themselves in our favour. Longevity is upon the increase: statistics prove it. The health of the community is good. Where seven or eight died formerly, only two die now; where pestilence once raged, it is now extinct.* The race improves. Stature and strength are greater than they used to be. Free institutions, freedom of thought, and religious as well as civil liberty, enlarge the sphere of vision, extend the faculties of the mind, and multiply the resources of happiness and enjoyment. Cloudy as the political horizon may seem, yet the gleam of light along its margin is bright and encouraging. The privileges of mankind are more fully appreciated, and less likely to be invaded or oppressed by domestic or foreign aggression than at any former period of the world's history. Steam and the electric wire are working wonders in a way that cannot be disputed. Their beneficial operations will not cease. They are public property; and their utility is too well understood ever to allow of their being laid aside and forgotten.

In regard to ourselves, as medical men, is the prospect less cheering than we could wish? At present we are overtaken, or at least they are upon whom the world has bestowed the meed of merit. But was it ever otherwise? Must it not continue to be so? The pet of the public lies at the mercy of an exacting patron. A favourite is never his own master; and when we complain of having more favour than enough, let us not forget those who repine because they are neglected, and get less than they want. In a certain sense the evil is irremediable. For

"Some must laugh, while some must weep;
So trips the world away."

And the ambitious will suffer, as well as achieve, the most. Except in a few favoured instances, "the cool, sequestered vale of life" is out of the question; and none but the old, the disabled, or the timid, would covet the seclusion.

* In the seventeenth century, the mortality was at the rate of seven per cent. on an average during twenty years. If the mortality of London had been at the same ratio in the last year (1859), instead of 61,617, about 194,204 deaths would have been registered. In 1665 nearly a third of the population perished by the plague.—*Registrar-General's Summary of the year 1859*, p. vii.

ART. VIII.—MEDICAL EVIDENCE:—THE COLNEY HATCH CASE.

ON the 12th of May last a lunatic, named William Swift, died suddenly in the Colney Hatch Asylum. The attendants stated that shortly before his death Swift staggered and fell in a convulsion which was regarded by them as an ordinary epileptic fit. From this the patient quickly recovered in a great measure, said that he was better, and asked for his supper, part of which he ate, but becoming suddenly worse, the medical superintendent of the male department, Mr. D. F. Tyerman, was sent for, but before he reached the ward in which Swift was confined, the latter had died. On the 14th, two days after death, the body was examined in presence of Mr. Tyerman. Several slight marks were observed on the neck and face of the patient. On the left side of the neck was a thin mark of a yellowish colour; on the right side of the neck, and also on the right side of the face and lobe of the right ear were slight marks of a bluish colour. On the abdomen, to the right of the umbilicus, was an extensive bruise. The marks on the neck were probably to be accounted for, and the bruise upon the abdomen was known to have been occasioned, by a serious struggle which Swift had had with one of the attendants three days prior to his death. Sundry marks upon the left wrist had been caused by the use of wrist-locks previous to the patient's admission into Colney Hatch.

No other indications of injury were discovered by the inspection of the body externally.

On the chest being opened it was found that the sternum had been fractured across the centre; that on the right side of the thorax, the 4th, 5th, 6th, 7th, 8th and 9th ribs had been fractured; on the left, the 4th, 7th, 8th, 9th and 10th. In each of the injured ribs the fracture existed a short distance from the cartilage, but in neither ribs nor sternum was there any displacement of the fractured parts. Beneath the right costal pleura there was ecchymosis in the vicinity of the fractures; there was a layer of blood in the anterior mediastinum; and there were about three ounces of sanguineous fluid in the left pleural cavity. The lungs were generally healthy and moderately collapsed; in the apex of the right lung cretified tubercle was found. The heart was not well contracted, and both sides were empty.

On examining the abdominal cavity a large quantity of partially coagulated blood was discovered within it, and on the posterior surface of the left lobe of the liver there was found a

laceration, two inches in length, but "not deep." A slight superficial laceration also existed on the surface of the right lobe.

The brain was examined, but no morbid appearances of moment, as bearing upon the cause of death, were noted.

There could be no doubt that the grave and extensive injuries so unexpectedly discovered in the chest and abdomen had caused the sudden death of the unfortunate lunatic, and the strictest inquiries were made in the ward where Swift had been confined at the period immediately preceding, and at the time of his death, to ascertain if he had been subjected to any violence on the part of the attendants. Nothing, however, was detected which yielded any confirmation of this first and most natural surmise. But it was known that on the evening of the 9th, about seventy-two hours before his sudden death, Swift had had, in another ward, a severe struggle with one of the attendants, a very powerful man. Swift, at the time in question, had retired to his bedroom for the night. There was then but one attendant on duty in the ward. Swift became noisy, knocking loudly at the door of his room, and crying out that he wished to see the Queen. In order to pacify him the attendant went to his room, but no sooner had the man entered the doorway than Swift struck him violently on the eye, and seized him by the neckerchief, making use of an expression which showed that he had been watching his opportunity. A desperate struggle now ensued, and both fell together upon the floor of the bedroom, the lunatic still retaining firm hold of the attendant's throat, who was barely enabled to call for aid to a tranquil patient engaged in an adjacent scullery. Through the instrumentality of this patient assistance arrived just in time to avert fatal consequences to the prostrated attendant. He was found still held by the throat in the grasp of Swift, the blood was oozing from his nose and mouth, the face was purple, and he was slightly insensible. Swift, almost exhausted by his efforts, released the attendant when aid arrived, and retired to his bed; and when again visited by both attendants, he bid them good-night, making no complaint of pain or injury. On the following morning the circumstances of the assault were reported to the medical superintendent, and the attendant who had been attacked stated that in his efforts to free himself he had struck Swift violently on the abdomen, which was bruised in consequence. The bruise thus occasioned was the one recorded in the notes of the *post-mortem* examination as being found to the right of the navel.

Could it be that the fractures of the ribs, and sternum, and lacerations of the liver, found in Swift's body after death, were caused by the struggle between him and the attendant on the

9th of May? Mr. Tyerman thought that this probably might have been the case; no evidence whatever being forthcoming, notwithstanding reiterated and most diligent research to show the likelihood of the injuries having been inflicted at any other time.

Swift was fifty-four years of age, a labourer, and had been admitted into Colney Hatch on the 24th February, 1860. It was then stated that he was suicidally disposed, very violent towards all who approached him, and that he had attempted to strangle the master of the Aldgate Workhouse. He was the subject of incipient general paralysis, the articulation being imperfect, the mind confused, and the general health much injured. His arms were marked with the pressure of wrist-locks, and the left wrist was much galled and blistered. He was first placed in the infirmary, and under the use of a nutritious diet and wine his health considerably improved. On the 8th of March, he was removed from the infirmary into one of the wards. Whilst in this division of the establishment his health continued to improve, and the paralytic affection greatly diminished. His delusions were freely expressed. He thought that he was the strongest man in the world, that he could infuse strength into others by blowing into their mouths and ears, and that he had killed several hundreds of Catholics. Such excitement as he manifested was usually associated with cheerfulness, and he was gratified when any mark of attention was shown to him. On the 9th of May he assaulted one of the attendants in the manner already described, and on the 10th he was removed, for greater safety, into another ward to which three attendants were attached, and in which there were special arrangements for the management of dangerous patients. He made no complaint of suffering, was somewhat excited, and admitted his intention to kill the attendant he had attacked. He moved about and took his meals as usual, and showed no signs of indisposition. On the day following, the 11th, he continued in an excited state, spoke freely of his power to infuse strength into others, and alluded in a cheerful boasting way to "his bruise," referring to the bruise on the abdomen. On this day an emetic was prescribed for him with a view of soothing the agitation, and he had also a warm bath as was customary on the Friday with all the patients in his ward. The appetite and movements were not affected. On the 12th he continued in the same state until evening, when he died suddenly, as already related.

From the history of the case, Mr. Tyerman considered that it was not improbable that the patient's sensibility to pain had been considerably diminished (a common occurrence in mania accompanied with paralytic symptoms); and that this loss of sensibility had masked the symptoms of injury to the walls of the chest and liver. Further, believing the death to have been immediately

occasioned by the hæmorrhage from the liver, he expressed the opinion, which he believed to be fully supported by several cases on record, that it was not necessary to suppose that the fatal hæmorrhage should have happened contemporaneously with the infliction of the injury, and that even an interval of seventy-two hours between the fatal effusion and the laceration of the organ was not inconsistent with surgical experience of ruptures of the liver.

Mr. Tyerman concluded, therefore, that, evidence to the contrary being altogether lacking, the whole of the injuries to Swift might be reasonably accounted for by the desperate struggle and the heavy falls consequent thereupon, which occurred three days before his death.

On the 17th of May a coroner's inquest was held on the body of the deceased lunatic, and an open verdict was returned.

Subsequently, the case was reported to the Commissioners in Lunacy, and they instituted a special inquiry into the circumstances of Swift's death. In the progress of this inquiry three or four of the lunatics who had been confined in the same ward with Swift at the time of the fatal event, stated for the first time that he had been subjected to great violence by two of the attendants, Slater and Vivian, shortly before his death. (The principal witness made his first statement on the 2nd of August.) Upon this information the Commissioners determined to take legal proceedings against these men, and on the 19th of September they were arraigned at the Central Criminal Court on a charge of manslaughter. Two lunatics only were brought forward in support of the charge, Samuel Clark and William Varney. Both men asserted that Swift had been treated with brutal violence by the prisoners shortly before his death. Clark stated that on the afternoon of the 12th (the day of death) Swift had been seized by Slater and Vivian, thrown upon the ground, dragged to a padded room, pounded with the fists, stamped upon with both feet, and also knelt upon. Varney asserted that Swift had been thrown down and dragged to his room, by the prisoners, on the afternoon of the 11th, and that he heard sounds of scuffling from the room, and the voice of Swift exclaiming, "Oh! Oh, Lord!" This witness on his preliminary examination before the magistrates had said that this scene had occurred on the 10th. Clark's account also differed in one or two important points from the evidence he had given before the magistrates. Varney, moreover, stated that it was usual for the attendants to take patients into the padded room and there "kick them about." There had been several severe cases, he asserted, in his ward, of late, the patients being quite sore after the violence. Previous to his admission into Colney Hatch, Varney had been confined

at Hanwell, and he spoke of the brutal violence to which he had frequently been subjected there on the part of the attendants, the doctors laughing at him when he complained. It is evident, indeed, that this witness was subject to delusions on the subject of violence.

In addition to the testimony of these two witnesses, medical evidence was also tendered to show that it was "impossible" that the injuries from which Swift had succumbed had been inflicted long before death. Mr. Luke, Vice-President and formerly President of the Royal College of Surgeons, Senior Surgeon to the London Hospital, and Surgeon to St. Luke's Hospital for Lunatics; Mr. Partridge, one of the Surgeons to King's College Hospital, and Professor of Anatomy in King's College; and Mr. Barnard Holt, the Senior Surgeon to the Westminster Hospital, gave evidence to this effect.

According to the report of the trial in the *Times*, Mr. Partridge "deposed that he had been in court and had heard all the evidence that had been adduced, and particularly that portion of it relating to the injuries the deceased was alleged to have received. His opinion was, that it was impossible for such injuries to have been inflicted on the Wednesday without the deceased exhibiting marked symptoms of having received them during the interval between that time and his death. The consequence of so many ribs being broken would be to most materially affect the respiration, and the patient could not breathe regularly, but would do so with great difficulty, and in such a manner as must immediately attract attention. According to his judgment, the injuries that were the cause of death had been inflicted not more than two hours before. He did not think that the fact of the deceased being a lunatic would have made any difference in this case as to the consequences of the injuries that had been received. Lunatics who had met with an accident, or who had received injury from any cause whatever, would, no doubt, act very differently from sane persons, and they might under some circumstances exhibit an indifference to pain; but in this case the chest would have entirely lost the support of the ribs, and the effect upon the respiration, in his opinion, must have taken place, and the patient could not have had any control over it.

"In cross-examination Mr. Partridge said that, if so much violence had been used towards the deceased as had been deposed to by the two witnesses Clark and Varney, he should certainly expect there would be some external marks upon the body of the deceased.

"Mr. Luke gave evidence similar to that given by Mr. Partridge. He also said he agreed with that gentleman as to

the possibility of a lunatic evincing an indifference to or concealment of pain in some cases, but that this could not be done when a patient had received such serious injuries as were exhibited in this case, and that the difficulty of breathing must have been apparent.

“Mr. Barnard Holt, one of the surgeons to Westminster Hospital, gave similar evidence, and this closed the case for the prosecution.”

At the preliminary examination of the prisoners before the magistrates, Mr. Luke is reported to have said (*Times*, August 11th):—

“I have had considerable experience as a surgeon, particularly with reference to the treatment of lunatics. I see all the patients as admitted at St. Luke’s. I have heard the evidence in this case, especially the medical evidence with regard to the *post-mortem* examination. In my opinion the deceased man Swift died from the general injuries described, which, in my judgment, must have been inflicted at one and the same time. I should think that death followed speedily on those injuries. I believe it to be impossible that a person who had received such injuries could walk about in apparently good health, his constitution exhibiting no derangement, and his pulse giving no indication that he had been injured. The fact of the person injured being a lunatic would not make any material difference. The injuries might be produced by external pressure without producing any external marks of violence. I do not think the injuries could have been inflicted on the previous Wednesday. There is no statement in the medical evidence of inflammation having occurred, which I should have expected had the injury been inflicted on the Wednesday. Had there been inflammation the pulse would have been affected. The respiration also would have been extremely difficult—that is, supposing the patient could so long have survived such injuries.”

Cross-examined.—“I do not judge solely from the absence of evidence of inflammation in forming my opinion that the injuries could not have been received on Wednesday, but that is one of my reasons. A man might have his sternum and eleven ribs broken without any external ecchymosis. That might be, though the injury was done by kicks or blows, if he had his clothes on. I do not think that blows with the fist alone could have done all this mischief. I differ from the other medical witnesses in saying that these injuries must necessarily have been accompanied with ecchymosis, and that the injuries might have been inflicted on Wednesday. A man with one or two ribs broken might go on a day or two without exhibiting much inconvenience, but not without any. His being a lunatic would

make no material difference. I differ from Dr. Tucker in thinking that it would. I have known cases where lunatics have injured themselves and have made no complaint. Among lunatics there are occasional instances of insensibility to pain, but in such cases there are other symptoms. There are other symptoms in this case. My impression is that the fractured ribs and sternum would have caused death immediately. Maniacs sometimes hurt themselves and do not complain."

Mr. Lewis.—"If the ribs had been fractured on the Wednesday, would that have caused death on the Saturday?"

Witness.—"I think it would have caused death at once, and he certainly would not have lived till Saturday without exhibiting very distressing symptoms, which could not have been masked."

Mr. Tyerman and Dr. Tucker, (one of the assistant medical officers of the Colney Hatch Asylum,) also gave evidence at the trial. Mr. Tyerman stated the opinions we have already ascribed to him, and on cross-examination he said:—

"The deceased was paralysed when he was admitted to the asylum, and his condition in this respect would render him less sensible to pain, and in some cases he believed it would occasion complete insensibility to pain. Patients afflicted with this form of insanity would sometimes attempt to walk about with broken limbs. He had seen several instances of this kind during his experience at Colney Hatch. In one case a patient who had fractured his knee-cap walked about without any apparent pain very shortly afterwards. In another instance, after a patient died, it was found that several of his ribs were fractured, and on the morning of the day of his death he said that he was quite well. He heard that this patient had sustained the injury in question by falling over his bed or over a chair. Cases of this sort were constantly occurring in lunatic asylums and other places. If there had been such a kicking and stamping upon the deceased as had been spoken to by the witnesses Clark and Varney, he was of opinion there must have been some external marks, but none such were visible upon the body of the deceased.* It was his opinion that many of the injuries sustained by the deceased might have been caused by the struggle with Gann and the blows he received from him on the Wednesday before his death. He had known Clark and Varney for some time, and

* It is not easy to conceive that Swift could have been pounded about the chest and stamped upon without being bruised, when we know that a blow upon the abdomen had occasioned an extensive bruise. It may be conceived, however, and it is not improbable, that if the attendant, a weighty man, fell heavily across Swift's chest during the struggle, the ribs and sternum might have snapped. Severe fractures of the ribs under such circumstances may, we believe, be found in the records of many asylums.

they had been under his care, and he was of opinion that no reliance could be placed upon any statement made by them, and if he were upon a jury he certainly should not give any credit to them. They were both subject to nervous delusions, and Varney had certainly a homicidal tendency, and a desire to conspire to destroy the lives of others."

Re-examined.—"There were no external marks to indicate by what means the ribs and sternum became fractured."

"Dr Tucker deposed that he saw the deceased between twelve and one o'clock on the morning of the day on which he died, and felt his pulse, which was moderately good. He made no complaint, and there was nothing to indicate that he had anything the matter with him."

Cross-examined.—"The deceased made no complaint of violence being used to him on Friday evening. He had heard the description given by the witnesses Clark and Varney, and he was of opinion that if the deceased had been kicked and stamped upon in the way they represented, for nearly an hour, there must have been some external marks of violence. Witness had had a good deal of experience of insane patients who were at the same time paralytic, and he was aware of several remarkable instances of their apparent insensibility to pain. In one case, where a patient had broken both the bones of his right leg, he pulled off the splints and tried to walk about on the stump, without exhibiting any appearance of pain. He considered it quite possible that all the injuries might have been caused on the Wednesday, and the deceased might not have exhibited any indication of the injury during the interval between that day and his death."

After a brief consultation the jury found both prisoners *Not Guilty*.

In a medico-legal point of view, this case is one of remarkable interest. Three of the most distinguished surgeons in London enter the witness-box, and upon oath, in a charge of manslaughter, assert, (1) that the fact of lunacy would make no material difference in the judgment to be formed of the consequences of certain severe physical injuries; and (2) that those injuries were of so grave a nature that it was "impossible" that the person subjected to them could have lived more than a very brief period after their infliction, or, supposing him to have lived for a longer or shorter time, that he would have exhibited manifest symptoms of serious disorder.

We shall not stay to question how it comes to pass that these gentlemen entirely ignore the recorded experience, and the facts upon which that experience has been based, of all the physicians

of celebrity who have had charge of lunatics, from the days of Esquirol to our own time, on the not uncommon occurrence among the insane of a greater or less degree of insensibility to pain (not indifference to, as Mr. Luke and Mr. Partridge worded it at the Central Criminal Court) which has altogether masked, or singularly modified, the symptoms of the most serious surgical injuries. We can merely note, without seeking to explain, the singular fact that the opinion of the distinguished senior surgeon to St. Luke's Hospital upon this subject clashes with that of probably every existing practitioner in lunacy. We shall simply cite one or two facts bearing upon the assertion, that the amount of injury inflicted upon Swift's chest was such that it was impossible that he could have lived even for a short period, without showing it manifestly in his breathing or otherwise.

A. B., a tall, stout, middle-aged man, with a dark complexion, and a wood carver by trade, was admitted into the —— asylum. He had been insane two years before, but was said to have recovered, and had, on his admission, been ailing only six weeks, this latter statement being somewhat doubtful. He was quite paralytic, spoke in a loud blustering tone, and in the deliberate manner of a general paralytic. He had the usual class of delusions found in such cases—enormous wealth, and so forth. He would sleep [about half the night, and when awake was rather noisy. He ate heartily, even greedily, and with the exception of the symptoms stated, seemed in excellent health. He was occasionally much excited during the day, but was readily pacified. Unless carefully watched he was apt to fall, as his legs afforded him but little support.

As this patient was so noisy and loquacious he was not examined physically, in the hope that the excitement would shortly subside, but he died rather suddenly on the thirteenth day after admission.

An examination of the body disclosed ten ribs fractured, six on the left side (from the fourth downwards) and four (from the sixth) on the right. The fractures occurred in a line extending from the junction of the middle and anterior thirds of the highest broken rib to the anterior extremity of the first false ribs. Several of the ribs were broken in three places. In these ribs one point of fracture was found to be converted into a false joint, a second to have a collection of pus, and a third to have callus around it, but not of any recent date. Fluid was found in both pleural cavities, the left containing about a gallon, the lower two-thirds of the lung on the same side being quite carnified. The right lung was healthy, the heart slightly enlarged, its walls being very thin. A few hours before his death this man

had been exhibiting his "very fine voice," as he called it, running up and down the scale in a very powerful but by no means correct manner. He appeared to be quite unconscious that any thing was the matter with him, and made no complaint whatever of pain and uneasiness, and expressed himself well satisfied with the treatment he received in the asylum. He was continually exclaiming how well he was, and nothing, either in his movements or in his breathing, had led to any suspicion that the walls of his chest had been seriously injured. An inquiry led to the conclusion that the injuries had been most probably occasioned by frequent falls, several of them across a heavy iron fender, which the man had suffered previous to his entry into the asylum. He was a heavy man, but after each fall he had contrived to scramble on his feet again, and invariably professed, in the manner of patients of this class, that he had not hurt himself.

On comparing this case with that of Swift's, it will be admitted that, if anything, the injuries to the chest in the former instance were of a more serious character than in the latter, and yet we find them completely masked until the death of the patient, by insensibility to pain.

M——, an incoherent and extremely restless lunatic, moved about as usual, made no complaint of pain or injury, and ate heartily up to the time of his death. On examining the body, six ribs were found broken on the right side and one on the left. No suspicions of these fractures had existed before death, although special attention had been drawn to the right side by the appearance of a swelling, which subsequently proved to contain pus, consequent upon the fractures. From the appearance of the fractured bones and from a rigid inquiry, there was not the slightest ground for concluding that the injuries were of less than twelve days' standing.

If then a greater or less degree of insensibility to pain has such an important effect in modifying or masking the symptoms ordinarily arising from serious physical injury to the thorax, it might be presumed—if there were not, indeed, numerous cases to bear witness—that the same condition would equally modify or mask the symptoms arising from injury in other parts of the frame. It is not too much to assume that it would not exercise an insignificant influence in masking injuries to the substance of the liver. But surmising that the hæmorrhage from the injured liver was the immediate cause of death in Swift's case, it is all-important to know if this would necessarily occur contemporaneously with the infliction of the injury. This question, so far as our information extends, does not admit of a positive reply. We know, however, that serious injuries of the liver are

not of *necessity* followed by hæmorrhage at all ;* also that when hæmorrhage does occur from a wounded liver, it may be recurrent.†

A case recorded by Dr. Walter Fergus, and published in the 31st volume of the Medico-Chirurgical Society's *Transactions* (p. 47), is exceedingly instructive. The following is a brief summary of this case :—

William Fisher, æt. 17, was standing on the shaft of a cart, when the horse moved ; he fell, and the wheel passed over the belly. He hardly complained, but said that there was a slight pain in the right side. The shock was very trifling, and no marks of violence were perceptible, and there was no tenderness on pressure. The pulse was thought to be a little accelerated. The night following the accident great pain supervened, which yielded to bleeding and opium. On the subsequent day he complained of pain only when he lay on his back. The next day (Monday) he had slight pain ; on Wednesday his appetite returned, and he left his bed ; on Friday he talked about leaving the hospital, but this was not agreed to, the pulse being sharp and the skin hot. The same day he was attacked with symptoms of acute peritonitis, and on the following Sunday he died, the ninth day after the accident.

“On cutting through the abdominal parietes there was an immense gush of a dark liquor, having precisely the colour and odour of bile ; in fact, it appeared only to differ from that fluid in being more liquid. On laying open the cavity of the abdomen, the intestines were found roughened as in the first stage of acute peritonitis. The liver was seen with a laceration, extending in the direction taken by the broad ligament, quite through its substance, and to a depth from the thin edge of two inches and a half ; another laceration extended about two-thirds of the length of the convex surface in a transverse direction ; this was of a comparatively slight depth, and was in a state advancing towards reparation.” The gall-bladder was also ruptured. No traces of hæmorrhage are recorded.

It is manifest, therefore, from this case and the cases we have referred to, that, in a medico-legal point of view, it is requisite to speak in the most cautious manner of the immediate consequences of rupture of the liver, even in the instance of persons suffering from no form of mental disorder.

We therefore feel fully justified in questioning the opinions of the three eminent surgeons examined for the prosecution, (1) as to the immateriality of lunacy in a medico-legal inquiry concerning surgical injuries ; and (2) as to the necessity of a rapid fatal

* See case quoted from the *Mémoires de l'Académie Royale de Médecine* for 1705, by Guthrie, in his *Lectures on Wounds of the Abdomen and Pelvis* ; Lect. i.

† See Paroisse, *Opuscules de Chirurgie*.

termination to those injuries, and the impossibility of their existing without giving rise to manifest symptoms during life.

It is not to be forgotten, however, that the opinions of Mr. Tyerman and Dr. Tucker on Swift's case were entirely based upon the assumption that he was to a greater or less extent insensible to pain. This supposition, in the absence of all actual experiment, could only have been warranted by the total failure of evidence calculated to throw a clearer and more decisive light upon the case. But, even in the absence of this evidence, was the assumption warranted? Is a diminution of sensitiveness to painful impressions observed with sufficient frequency among lunatics to justify the assumption in such a case?

On this point we have the recent positive assertions, derived from experiment, of Dr. A. Briere de Boismont, one of the most distinguished alienist physicians in Europe. He states that—"Anæsthesia has been met with many times in insanity on careful examination. It is common in the second and third stage of the disease. *For a long time we have experimented on our paralytics* [the class of cases, be it borne in mind, to which Swift belonged] *and in nearly every case we have noted diminution of cutaneous sensibility; in some instances, indeed, there was complete loss.*"*

It cannot be needful that we should add many other remarks upon this important and highly interesting medico-legal case. From a careful review of the whole of the circumstances, we think that the conclusion must be obviously in favour of the opinions expressed by the medical superintendent of the male department in Colney Hatch. That these are justified by the evidence adduced, and that they are those which best meet the difficulties of the case, we fully believe; and we are much gratified to think that, medically as well as legally, there is no necessity to suppose that a brutal homicide has been perpetrated in the wards of our largest public asylum.

In conclusion, we would remark that this case of Swift's indicates the importance of noting, from time to time, the actual degree of cutaneous sensibility possessed by patients in asylums.

* "Medico-Legal Studies on the Perversion of the Moral and Affective Faculties in the Precursory Period of General Paralysis"—*Annales d'Hygiène Publique et de Médecine Legale*, Octobre, 1860. See also p. 60 of the present number of this Journal. We would, in further illustration of this subject, direct attention to a remarkably interesting paper by Dr. Auzouy, "Des Troubles fonctionnels de la Peau et de l'Action de l'Électricité chez les Aliénés," to be found in the October number of the *Annales Médico-Psychologiques* for 1859. See also a translation of the portion of this paper, relating to cutaneous sensibility, in the *Journal of Psychological Medicine*, vol. xiii. p. 68. A remark of Dr. Auzouy's may be reproduced here with advantage. "M. Beau," he states, "has established a distinction as exact as ingenious between anæsthesia of pain, or *analgesia*, and anæsthesia of touch; he justly observes that tactile anæsthesia necessarily begets anæsthesia of pain, whilst the contrary does not hold. In fact, analgesia exists most commonly among the insane, the tactile sensibility not having disappeared."

ART. IX.—MATERNAL LOVE IN NATURE;

By J. L. C. SCHROEDER VAN DER KOLK, Professor in the University of Utrecht.

Translated from the Original Dutch by WILLIAM DANIEL MOORE, M.D., M.R.I.A., Honorary Member of the Swedish Society of Physicians, and of the Norwegian Medical Society.

TRANSLATOR'S PREFACE.

IN the course of a lengthened correspondence which it has been my privilege to enjoy with the eminent Utrecht Professor, Heer J. L. C. Schroeder van der Kolk, in reference to an important physiological work of his, which I have translated and edited for the New Sydenham Society, the author was good enough to send me, with some other minor essays, a copy of a dissertation read by him before the Physical Society of Utrecht, at one of the meetings to which ladies are admitted, on "*Maternal Love in Nature.*"

It appears to me that the distinguished author has, in this essay, with peculiar force and beauty, shown, that in the works of nature the great truth that "God is love," is exhibited in a manner second only to its demonstration in the all-important fact, declared by the Saviour himself, that "God so loved the world, that he gave his only begotten Son, that whosoever believeth in him should not perish, but have everlasting life." I have therefore thought that an English version of the essay might be not unacceptable to my fellow-countrymen.

The subject specially chosen by the author for the illustration of the statement just quoted, is the means taken by the parents, in every class in the animal kingdom, for the preservation of their young. This is beautifully traced in the original essay (and I trust I have succeeded in the following pages in faithfully conveying the writer's meaning, however much his clear and energetic style may have suffered in the translation), from the insect which providently lays up for the offspring it is never to behold, a sufficient store of the necessary food, to the Christian mother, who provides not merely for the temporal wants of her children, but endeavours also to feed them with "the meat which endureth unto everlasting life," by unfolding to them, so far as that glorious theme can be comprehended here below, the vastness of redeeming love, and by seeking to excite in their youthful breasts that response of faith, and hope, and love, which alone can form the basis of all true morality.

WHEN we attentively survey the economy of nature, and contemplate the profusion of life everywhere scattered under the

most conflicting forces and influences ; the unity of object combined with the greatest diversity of means, and the most steadfast order observed amidst the greatest apparent confusion, constrain us to admiration and reflection. We see among the myriads of creatures inhabiting the surface of the earth, an incessant conflict for life and death ; the stronger everywhere pursue the weaker, and thousands of animals daily become the prey of the wild and ferocious race, which precisely therein finds the means of existence ; so that the death of the one is the condition of the self-preservation of the other : and yet amidst this endless annihilation the whole continues to exist.

How is it then, that, with this constant death and devastation, in the great economy of nature the equilibrium is so steadily preserved ? Why do not the lions, the tigers, and the wolves exterminate the defenceless races from the surface of the earth ; how is it that the eagles, the falcons, and other birds of prey do not extirpate the weak and tender-winged tribes ; why do not the crocodiles depopulate the rivers, the sharks the seas ? What, above all, are the means whereby the defenceless new-born progeny is protected from all these enemies, and in its helpless condition finds all its wants perpetually provided for ?

To this apparent confusion, this omnipresent destruction, a limit is placed by the most adequate provisions. The ferocious animals are restrained in their wildness, where it is necessary, all their inclinations are regulated according to their wants, their passions are led and guided, and in default of knowledge, of foreseeing reason and a calculating understanding to discover for themselves the means for their own defence and of protection for their offspring, the Creator has bestowed on them the necessary gifts, has caused tendencies and instincts, adapted to the mode of life of each, to germinate from their organization, has thought for them, and has thus conducted the whole animal kingdom, as it were with invisible reins, with a wisdom and providence far above all human calculation.

The innate tendencies are emanations of a higher will implanted in the animal world, and are therefore perfect as the Source whence they have issued ; they are the language in which the Creator speaks in nature, and therefore the true beauty of nature is not to be found in the brilliant colours of the flower nor in the splendour of the forest illumined by the rays of the rising sun, nor in the most beautiful landscape, but in the wisdom which radiates in all, in the thoughts of the Creator himself, which we may read in nature as in an open book, whence His wisdom and greatness are reflected as from a polished mirror, in a thousand glittering beams, but ever pure. The true and proper beauty of

nature manifests itself most eloquently in the loving maternal care of the rising generation exhibited throughout the whole animal kingdom. A few examples will amply prove this proposition.

It is a generally acknowledged truth, that unity of object is always combined in nature with the greatest diversity and abundance of means of attaining that object. In no part of the whole creation is this more striking, than in the care taken for the continued existence of the various species of animals. The great difference, however, which prevails in the mode of life and necessities of the thousands of animals inhabiting this earth, must be attended with an equally great difference in the means whereby the object is attained.

Many animals live too short a time to be able to take care of their young, and are dead before their offspring have yet left the eggs; but neither are these forgotten—in their behalf, too, maternal love has been exercised.

Many, as the fishes, are too little attached to one place, in consequence of the necessity of seeking their own food, or of avoiding dangers, to be able themselves to bring up their young; but to the latter, also, nature is a careful mother. It is only among the higher animals, which from their organization and mode of life are better adapted to the purpose, that the education of the young is intrusted to the parents. By the former, the young are left to their fate; and here nature alone is, as it were, the mother: in the case of the latter, she resigns this care in part to the parents, by endowing them with maternal love and with the means of bringing up their offspring.

With a view to observe some order in the consideration of this rich field of nature, I shall, after a few general remarks on the care of the young which is manifested throughout the whole creation, mention some traits of the instinct and innate love of animals exhibited by the entire animal kingdom, from insects up to man, in the nurture of their young. Among the difficulties to be overcome by nature in bringing up the young, the provision, in sufficient quantity, of food adapted to their delicate constitution, deserves our first attention. This must not only vary for the several classes of animals, but must also differ from that which the stronger stomachs of the parents can digest. With this object nature has given to the mammalia the breast, where the young find in the mother's warm milk a food quite adapted to their still tender stomachs, and requiring but little effort to change it into chyle and blood. Some birds, particularly those which are granivorous, she has provided with a crop, where the food is softened and prepared for the weaker digestive organs of

the young ; while the young of the lower classes of animals immediately after birth know how to select their food, which through the special management, or innate care, of the parents, whereof I shall hereafter speak, is always present for them in abundance.

A second very beautiful provision of nature is, that animals, at least in our regions of the globe, are born, not at all seasons of the year, but in the spring ; hence they find the temperature and air their growth requires : they have no winter's cold nor keenness to endure, and are supplied with plenty of food adapted to their wants. In spring, the vegetable kingdom is sprouting up anew, the grass and leaves are still tender, soft, succulent, and abundant ; the young of the herbivora therefore quickly find everywhere easily digestible nourishment, enabling them to thrive luxuriantly. Beasts of prey obtain a rich harvest in the abundance of other young animals, whose easily digestible flesh is quite adapted to the weak stomachs of their own offspring ; the latter can exercise their not yet fully developed powers in catching the young of other species, while, if they had to contend alone with the parents, they must inevitably be overcome.

The same is true of insects and other lower animals, both those which live on plants and those which feed on other insects : in some the arrangement of nature for the preservation of the species is wonderful. The vine-fretter (*bladluis*), for example, which occurs so abundantly in our gardens, during the spring and entire summer brings forth living young, and all of the female sex ; there is then abundance of food, and not an individual need perish for want : but in autumn, when the leaves fall off, and vegetation ceases, all would inevitably die of want of food, or be killed by the approaching cold of winter. A single night's frost would therefore, without some special provision, be sufficient to blot out this entire species from the list of living beings ; but in the last generation their organization is so altered, that males too are brought forth, when, after pairing, no more living young ones are produced, but eggs, capable of enduring the severest cold, from which, in the spring, when the leaves, their food, have shot out, the whole race once more appears, which now, like their predecessors, are again viviparous.

A third important provision is the defence of the young against danger. Among the higher animals this is intrusted to the parents ; but in many of the lower classes the young are, with some exceptions, neither taken care of nor defended by the parents, these being already dead. Other animals may consequently persecute the offspring with impunity, and the latter become helplessly a prey to the gluttony of the former ; but, in addition to many other precautions, their destruction is prevented by the fact,

that the more numerous the dangers are with which the animals or their young have to contend, and the greater the number of animals is which feed on them, the more their multiplication is increased; hence this is greatest among insects and some other of the lower classes of animals: thus one species of moth brings 200,000 moths yearly into the world. A nocturnal butterfly is said to be able to produce nearly a million and a half of eggs in the third generation. If the vine-fretter were for a year free from destruction, the earth would soon scarcely have room for all its descendants, as it is said to be capable of producing in the fifth generation about 5,000,000,000 of young, and at least twenty such generations take place in the year. This fertility is certainly astonishing, but by it the species is able to withstand the multiplied persecution to which it is exposed, and a profusion of food is provided for hundreds of animals, which live by their destruction.

In fishes, too, we meet with similar fecundity; thus the herring lays between 20,000 and 50,000 eggs; 383,000 have been found in a tench, 621,600 in a carp, about 1,000,000 in a thornback; in a codfish 3,444,000 eggs have been met with. As a great number of these eggs are devoured by other animals, and as many perhaps are not fructified, this loss is obviated by their great multiplication, and some provision is made against the destruction of the species. If the large herbivorous animals were as fruitful as the small, the vegetable kingdom would be devastated; did beasts of prey increase as much as the herbivora, or did large beasts of prey increase as rapidly as the small, excessive destruction would be the result.

Thus in nature everything is calculated beforehand, and the necessary equilibrium and order are maintained. Beasts of prey are the pruning-knife in the hand of nature, with which the superfluous sprigs are cut off, and growth and life are everywhere protected. Such animals, again, depend upon the abundance of their prey. Spitzbergen, for example, has scarcely a single insect on its plants, and therefore not a bird to feed on them. In Greenland we are already acquainted with more than twenty different insects, and here there are at least two species of birds which are nourished by them. In the warmest countries of America, where the number of insects is extraordinarily great, several hundreds of different kinds of birds are known, which limit the excessive augmentation of the insects, and live on them, to serve, in their turn, as a prey to other animals; thus all are harmoniously connected, and the fertility of one species is the source of life of another.

But should nature, in which so much plunder and destruction reign, be accused of cruelty, we find that even this is provided

against. The poison of many animals appears rapidly to make their prey insensible, and to protect it from torture, and the tusks of the larger beasts of prey are so situated, and the animals themselves are so guided by instinct, that they always almost immediately bite through the great arteries leading to the brain, producing loss of consciousness in a few moments, and rendering death less painful. The much more distressing end from famine, want, and old age, is thus avoided, under which otherwise the animals would probably sink after a long period of suffering.

But it was not my object to indicate the mode in which the equilibrium of nature is maintained, but rather to adduce some proofs of the care taken by nature for the rising generation. Nothing affords such striking views of this, as the instincts and inclinations of the animals themselves, whereby they are so correctly and adequately guided in their actions, and in which we must above all admire the wisdom of the Creator, who has ruled all this with such perfection.

Where animals are still weak and tender, and too imperfectly developed to guide themselves, fixed innate tendencies are given them, to fill the place of reflection and of reason; where they are incapable of thinking for themselves, nature thinks for them. "Nature," says Herder, "thought for them, when she placed these inclinations in certain animals and not in others, and in its organization compelled the creature to see, desire, and do what she had pre-arranged for it."* If we now briefly trace from this point of view the animal kingdom from the insect up to man, we shall find maternal love of the offspring everywhere directed in the most admirable manner.

Among insects, for example, we meet with many species whose young cannot take care of themselves, and where the parents are dead before the future generation comes to life; without a special provision of nature, or arrangement on the part of the parents, these animals must perish; but in this case the mother provides for her offspring before it is yet in being, and seeks its food ere she has as yet laid an egg. Here too, as in higher classes of animals, the food which the young consume is almost always wholly different from that of the parents; but the female does not provide for her own taste or wants, but lays her eggs in the situations where her young ones can obtain the support adapted to them. The sand-wasp digs holes in sandy ground, in which she places a large spider or caterpillar, which she does not kill, but by wounding its nervous system in a particular point with her sting, only stuns and paralyzes, and thus prevents its corruption and putrefaction. Having done so, she then lays

* Herder, *Ideen zur Philos. der Geschichte*, 1 Th. p. 97.

an egg in each hole, where the young consequently finds its fresh food when it leaves the egg. But other wasps again from time to time open these passages, so made as to be undiscoverable to any others and carefully closed, so soon as the larvæ have consumed the provision laid up for them, which the parents seem to know exactly, lay fresh provisions in the nest, and close the latter accurately, to prevent the advent of any enemies. The wood-wasp brings to the ovum into the cell a sort of dough prepared by her, which is not adapted to her, but is the most suitable food for the larvæ emerging from the egg. The solitary wasp collects eleven or twelve little green caterpillars or maggots, although she herself lives on vegetable food: she attaches these to the egg, as if aware that the food she herself uses would be injurious to her young; the larva which comes out has in these just a sufficient stock of food suitable to the period which shall elapse until the perfect insect can support itself from the vegetable kingdom. According to Kirby and Spence, the number of the maggots depends upon their size: if they are large, the wasp uses only eight or nine; if they are smaller, eleven or twelve: but she always seeks full-grown maggots, apparently foreseeing that only animals which have attained their full growth could live long enough in the nest without food, while, if they were still young and growing, they would soon die of want and putrefy.*

Thus also the butterfly which produces the annular caterpillar, herself sucks honey from the flowers; but who has taught her, as she has never seen them, that her young, which are not to emerge from the eggs until the following year, will not require honey, but young leaves? She therefore lays her eggs not in the flower, but also not on the leaves, which fall off in autumn, but attaches them with a resinous matter, impermeable to water, around the young branches, as if she foresaw that the fostering vernal sun would make the tender leaves bud forth, so that the young caterpillar finds its food as soon as it leaves the egg.

Nor is the fact less remarkable, that the young ones do not leave the eggs until the fresh leaves have already begun to germinate, which takes place at very different times in different kinds of trees. Thus there is no apparent difference between the eggs of an aphid of the birch-tree and those of one of the ash; and still, under the same temperature and in the same climate, the eggs come out simultaneously with the budding of the leaves, a month earlier on the birch than on the ash, which so much later unfolds its youthful green. Spence took a branch from a birch-

* Kirby and Spence, *Entomologie*, Stuttgart 1823, 1 B. p. 382, *et seq.* (The English reader may find the original of the passage referred to in Kirby and Spence's *Introduction to Entomology*. London, 1816, 2nd edition, vol. i. p. 347.—TRANSLATOR.)

tree laden with such eggs, and placed it in water in his warm study, where the leaves expanded a month earlier than under ordinary circumstances, but with them the young aphides also appeared.* Who does not recognise in this wonderful harmony a true maternal care on the part of nature for the least of creatures, without which they would almost always, for want of the earliest and juicy green, miss their proper nourishment and perish? But those insects whose young ones come out in summer, lay their eggs on the leaves themselves, as if aware that in their case the precaution of attaching them to the branches was unnecessary.

Sometimes not only the food, but even the medium in which they live, is different. Thus the larvæ of dragon-flies, of the ephemera, of different kinds of midges, and of several other insects, live in water, which is absolutely fatal to the parents; the latter, however, overcome their natural dread of that fluid, and lay their eggs in it, frequently indeed risking their life to preserve that of their offspring. And where should I end, were I to attempt to describe the storehouses of bees, wasps, and ants, which are in themselves so worthy of consideration, but the description of which would exceed the limits of the present essay?

Some insects live to see the birth of their offspring, and the care of the latter is accordingly intrusted to the parents, by whom the young are tended with no less love than is manifested among the higher animals. Thus certain spiders enclose their eggs in a spun purse, which they fasten on their backs and carry about with them. If this purse be carefully taken off the mother, she leaves a long thread attached to it, and draws the eggs, so soon as they are let go, quickly to herself again, for the purpose of escaping with them. Bonnet placed one of these spiders before the conical hole of an ant-lion, a very voracious animal: the spider immediately attempted to escape, but the ant-lion seized the bag of eggs, which he endeavoured to bury under the sand. The spider turned to oppose him with all her might; at last the bag was torn off, whereupon the spider seized it with her jaws, and redoubled her efforts, but in vain; the ant-lion was the stronger, and buried both! The unfortunate mother could have saved her life by forsaking her eggs, but she preferred allowing herself to be buried alive, rather than that she should be separated from her offspring.† When the young spiders creep out of the bag, which is opened for them by the mother herself, they fix themselves upon the back of their parent, who carries them about with her for some time, and carefully tends them.

* Kirby and Spence, l. c., Band II. p. 485. (Vol. ii. p. 434 of the second English edition.)

† Kirby and Spence, l. c., Band I. p. 397. (Vol. i. p. 360 of the English edition already quoted.)

Even the scorpion, in other respects so generally abhorred, affords an example of maternal love: thus for instance, so soon as she apprehends danger, she opens her mouth wide, into which her very small and tender young ones creep; these she carries in her closed mouth into a place of safety, where, opening her jaws once more, she delivers herself of her beloved burden.

I might still adduce a number of striking illustrations of the point under consideration, but the foregoing may suffice to convince us, that even the most despised and neglected creatures, whom we often stamp with the name of vermin, proclaim to us the greatest wonders in nature, and prove that all creation is tended with equal love and goodness as well as with infinite wisdom and perfection.

Although fishes leave their eggs to their fate, they are nevertheless by no means destitute of maternal care. Impelled by their natural instinct, they seek by preference such localities to deposit them, as are exposed to the least danger, and afford, in the multitude of water-insects which throng these places, an abundance of food for their future young ones. Some, as the salmon, for this purpose swim up rivers, and with amazing force and agility succeed even in leaping up waterfalls, of which I was myself once an eye-witness in the case of a trout. The salmon then dig a pit in the sand, in which they lay their eggs, and cover them up, whereby they are kept from being washed away and separated from one another.

In the river St. Lawrence above the waterfalls of Niagara, many fishes even make little dams on the strand, of small stones, which they collect with their mouths, to prevent the eggs, laid behind them, being washed away by the force of the current.

Some species of stickleback (*Gasterosteus*) go so far as to construct nests, just like birds, in which the eggs are deposited. The male builds an arched nest of vegetable fibres and filamentous seaweed, and glues it with the slime of his body, first fastening the foundation by constantly pressing it in more firmly by rubbing it: if a branch or stalk in the structure does not answer, he draws it out and substitutes another, then covers the nest with an arch, and bores a second opening in it, so that he can swim through. When this is accomplished, he seeks among the neighbouring fishes of his species a bride, just then adorned by nature in unusual colours, and conducts her to his nest as to a bridal chamber, where the eggs are then laid. When this is done, he fetches a second wife, and so, according to the statement of Coste, these nests sometimes contain from 1000 to 2000 eggs.*

But in contrast to what we observe in other animals, the male

* M. Coste, *Instructions pratiques pour la Pisciculture*, 1853, pp. 67 and 74.

alone keeps guard over the nest, in which the female has no exclusive share; on the contrary, the females are even his most dangerous enemies in endeavouring to devour the eggs. It is then his hard task indefatigably to defend the latter for a month against the frequently repeated attacks of these plunderers, during which time he does not leave the nest, but incessantly cares for all. He begins by first strengthening the nest, stops one opening closely, and covers the nest with little stones, often half as large as his own body, and which he fetches with difficulty from the neighbourhood. He has then only one opening to defend, and keeps continually before it, making a constant movement with his anterior fins, so as to keep up a perpetual stream of fresh water over the eggs, which would otherwise spoil and not come to maturity. During this time he drives away every other fish or female which comes too near his nest. If the number of his enemies is too great, he employs cunning, and pretends to dart upon some prey, withdrawing for some moments, whereupon his enemies, eager to participate in the unseen booty, follow him; he thus entices them from his nest, but quickly returns to his beloved habitation. If he succeeds through these unwearied efforts in preserving his treasure until the young are on the point of coming out, he redoubles his exertions; he again removes the little stones, makes several openings in the nest, increases the constant stream of water, and places the eggs at one time near the side, at another near the middle of the nest. If, after ten or twelve days, the young fish have come out, he is obliged still for a long time to protect them from enemies: at first, on account of the heavy yolk-bag adhering to them, they can with difficulty move; but he does not suffer one to leave the limits of the nest, or, if that happens, he brings it back in his mouth; if many deserters follow, he sometimes seizes a number of them together with his mouth, but without injuring them. As his numerous family become larger, they require more room, and he now allows them to swim in the immediate vicinity of the nest, but, like a shepherd's dog, swims constantly about them, to keep his flock together, until, after twenty days, he can leave them to themselves: although under other circumstances voracious, he has during all this time allowed himself no food. Can the maternal care of nature express itself more strongly than in this insignificant fish?

Nor is this maternal care of nature deficient in the amphibia, although they must almost always leave their young ones to their fate. In crocodiles, this care is carried further than in many others. According to van Humboldt* they seek their eggs,

* *Reise in die Aequinoctial Gegenden*: Stuttgart, 1815: tome iii. 427; also Burdach, *Physiol.*, 3 B. p. 117.

covered up in the sand, towards the time when the young come out, call their young, which answer them, lead them to the river, and protect them against danger. But this the tortoise, which has in its shield the means for its own defence, but has received no weapons from nature, cannot do. But nature is not therefore exhausted of her means for the defence of the offspring. The sea-tortoise, for example, likewise digs a hole in the sand on the shore, and covers this again to let the eggs be hatched by the rays of the sun ; but scarcely have the young ones left the eggs, when a variety of birds and other animals pursue them. But who must not admire the instinct which impels them immediately to betake themselves to the sea, and so to elude their enemies ? If they be stopped in their course, and an attempt be made to divert them and make them take another direction, they immediately turn back to repair to the sea, which they have never beheld. Who has taught them the way and given them a compass ? and who does not admire the incomprehensible instinct of nature by which they are involuntarily impelled to watch for their self-preservation ?

But nowhere do we find the most tender tokens of love and care, a constant eagerness and attention for the offspring, for which they seem, as it were, alone to live, more evidently and strikingly marked than in birds.

Here we already observe a higher development of parental love ; their care is greater, their passions are more noble, and are still further elevated by a remarkable peculiarity, which we meet with less frequently among the lower animals, namely, a conjugal connexion—a sort of marriage. Who does not recognise in this respect our doves, and especially the turtle-dove, so often sung by poets, as examples of mutual faith and love ? And in this the special care of nature again appears, that we may assume it as a general rule that the impulse to this mutual union is peculiar to those animals whose young ones need, in the earliest period of their life, the care of both parents ; in birds, as ducks and hens, whose young ones immediately find abundance of food, this was not so necessary ; but where the food must be brought from a distance, while the unfledged young ones cannot long be deprived of the warmth of the mother, the care of both parents was indispensable, and here we find this connexion, or rather marriage, instituted by nature herself.

This matrimonial connexion lasts in some animals as long as the common care of the young requires it, and does not cease until the latter are full grown ; this is, for example, the case with some mammalia, as the bat, rats, and rabbits. Thus also with many birds of prey and singing birds, as well as with the raven ; at the time of emigration the pairs separate, but appear

to unite again in the following year; in others, as the eagles and doves, and among the mammalia, foxes and deer, this connexion lasts through the whole of life. Of this a striking example was afforded by a stork whose wife had been prevented by a wound from undertaking the journey; during three consecutive years he sought her each spring, and then remained with her the following winters also.* This connexion is very close in parrots, and particularly among the so-called *inseparabiles*. Bonnet had kept a couple of these birds for four years, when the female fell from old age into a state of debility, and could no longer reach the feeding trough, but was now fed by the male; and when she became unable to get on the roosting perch, the male endeavoured with all his might to help her up. When she died, he ran about her in great distress, endeavoured to give her food, uttered a mournful cry, and died himself a short time after.† Nature even decorates many birds at pairing time with feathers of unusual splendour, as if she wished thus to heighten conjugal love. Others sing their good fortune in most melodious tones; thus the turtle-dove coos, the lark rises singing in the air, and the nightingale utters his beautiful songs, while his spouse is brooding. But as soon as the young are brought forth he is silent, as if he feared to betray the proximity of the nest, and now he helps to feed his offspring. In this the parents even use the greatest caution, and never fly directly to the nest, but conceal themselves at some distance in the bushes, so as to steal unobserved to their young, whom they leave again with equal circumspection.

Many birds even remove their young when they observe that they are discovered; thus, if one of the young be taken out of the nest of a night-owl, the parent will carry away the remaining little ones in the course of the following night; the same we often see in dogs and cats. The cunning with which birds endeavour to decoy enemies from the nest is equally remarkable; for example, if a dog or a man approaches the nest of a partridge, the male first flies up with a cry of terror, and thus warns the female, but quickly falls to the ground with dependent wing, as if he could not fly or was wounded, and so allures the enemy by the hope of an easily gained booty from the nest, while the female uses the moment to escape with the young. The same is met with in other birds. Coste relates that he was himself once the dupe of the cunning of a lark, which he saw suddenly roll before his feet and with difficulty steal away, as if it had no strength to move; he bent to take the animal in his hand, but at the moment when he thought to seize it, it made a fresh effort, though it ap-

* W. Vrolik, *Het leven en maaksel der dieren*, 1 d. p. 58.

† Burdach, *Physiol.*, 1 B., p. 366.

peared to be able only with great difficulty to remove a little farther. Thus the bird enticed him to an adjoining field, and when he thought he had brought his pursuer far enough from the track of his nest, flew at once joyfully and briskly up, and made his triumph at the result of his cunning known in lively songs.*

Bonnet mentions swallows which flew even into burning houses to save their young or perish with them.†

But the maternal care of nature is visible in birds chiefly in the construction of their nests, which they prepare with an industry and art sufficient to surprise any one who reflects upon the instruments they have to work with. In this case the bird provides for its young before a single egg is laid.

In most birds the male brings the material, and the female builds the nest. Birds' nests are, like all artificial products which are prepared by instinct, perfect of their kind, and deserve the name of masterpieces. Where nature is the teacher and the assistant of the undeveloped intellect of animals, everything is equally beautiful and adequate, worthy of her, perfect, and above criticism. Some general observations and examples selected from the abundance of matter at our hands may suffice to establish this proposition.

Birds' nests are always calculated according to the number and size of the young ones, and in this no bird is liable to err; small eggs, which cool more rapidly, require a more persistent warmth, and therefore the smaller birds build deeper nests, and the eggs lie on a softer and better heated bed, in consequence of which they do not cool so quickly when the birds fly away. Thus the nest of a lark is much deeper, and the eggs are warmed to a higher degree than that of a stork or goose. They line the inside of the nests with substances which are bad conductors of heat, such as straw, moss, hair, down, or feathers. The care of the crossbill (*Loxia curvirostra*) of northern countries is remarkable in this respect. This bird lays her eggs in January, when rain and snow cover the earth, because the fir seeds, the food of her young, exist in abundance then, and not in spring. But her nest would be soaked with the constant wet, and hatching would be rendered impossible by the cold so produced, were it not that nature has taught her to smear her nest with resin, as if she knew that this makes it impervious to snow and water.

But provision is made in the most ingenious manner by birds in the construction of their nests not only for warmth, but especially for the protection of the eggs and young ones. The nests are, in fact, more complicated and better adapted for defence in proportion to the danger to be apprehended, and their architect-

* Coste, l. c. p. 78.

† Burdach, *Physiol.*, 3 B., p. 124.

ture is even completely modified according to the particular enemies the occupants have to fear, Thus our singing birds usually build their nests in the thickest foliage, or in the hollow of a tree, where they are scarcely visible or accessible to birds of prey. This would, however, not secure birds in the warmer regions of the globe from the attacks of apes and serpents, which in great numbers persecute them; but many of these birds build their nests in the extreme branches of trees, frequently in such as overhang water, which are beyond the reach of their enemies.

The Bengal crossbill, not content with this, prepares a cord nearly a yard in length, constructed of vegetable fibres and dry stalks of grass, which he attaches to the extreme branches of trees above the water, and on this he suspends his nest, which is then swung to and fro by the wind, and is unapproachable by any other animal.

In some of these nests the opening is at the sides, in others it is even turned downwards towards the water, over which it hangs, and leads by a side passage to the young. The tailor bird fastens three leaves of a tree with cotton thread to one another, by means of its beak, and makes a knot at the end of the thread to prevent it slipping off; this nest is scarcely distinguishable from the other leaves of the tree.

In Abyssinia it often rains incessantly for many months, with west winds, but the *Loxia Abyssinica* builds its nest so that the opening is always turned to the east, and the eggs are protected above from the rain by an impervious covering. Our swallow attains the same object, by suspending his artfully constructed nest on the beams of our houses. In the East Indies a species of swallow forms the well-known edible nest with the mucus of its stomach, and attaches it to almost inaccessible rocks.

The mode of life and feeding are also kept in view, and many birds accordingly build their nests where they can most easily get their food; thus the eagle and other birds of prey construct them on lofty rocks and trees, whence they have an extensive view, and can easily perceive from a distance the little game; the lapwing and others build on the soft ground, where they can readily find the worms on which they live, and select in preference the side of a ditch or channel, where they can leave the nest unobserved. Water-birds build their nests on the shore, or even construct floating nests on the water, so that there can be no danger of drowning in case of excessive floods.

Proportionate to this is the care with which birds cherish their eggs or offspring: they do not mind their want of weapons, but often defend them at the risk of their lives. The little humming-bird, which is occasionally a prey to a certain species of spider, defends its eggs with such fury that it flies in the face of any one

who approaches them. Among many birds of prey the defence of the young is intrusted to the mothers, but in such cases the females are larger and stronger than the males. They hatch the more constantly the nearer the young are to coming out, as if they knew that cooling is then much more dangerous to the latter; accordingly wild ducks, which at other times are so timid, then often let themselves be taken on the nest in the hand. Some birds, especially those whose eggs are white, as ducks, cover their nests, when they leave them, with hay or leaves, to prevent them from cooling, and to conceal them from enemies; the lapwing does not do this, its dark and green eggs are nearly the colour of the grass and earth, and therefore do not strike the eye.

The maternal care of nature is also particularly visible in the different development of the young on leaving the shell. Thus the young of those birds which build their nests on the ground, as hens, ducks, lapwings, and others, come into the world with tolerably strongly developed feet, and very quickly leave the nest; they then either repair forthwith, like young ducks, to the water, and seek food for themselves, or follow the mother, who lays their food before them, and with peculiar tones invites them to use it, or warns them of approaching danger. But if the young of those birds which build their nests in trees or on lofty rocks were to leave the nest immediately, they would fall down and be dashed to pieces; this is, however, also guarded against, inasmuch as the latter come into the world in a much more imperfect state, as all the eggs of these birds are considerably smaller, and the young are therefore less developed when leaving the shell, being for the most part naked and blind, and their feet being so weak that they cannot run until they are able to fly. This singing birds and birds of prey are seldom able to do until after the lapse of two or three weeks. The young of fowl and waterfowl are very soon able to find their food, and to avoid danger, but do not fly for two or three months; in the first class mentioned the wings are more developed than the feet, in the second class the case is reversed; in the latter (hens, &c.), the care of both parents is not so necessary, and the duty is therefore for the most part left to the females, and in many instances the male even leaves the female at the time of hatching, to return towards autumn.

In singing birds and birds of prey, the male and female hatch and take care of their tender young ones alternately, particularly when the food is difficult to obtain, and, as often occurs, is only to be had at a great distance. Sometimes even, as has been observed in woodpeckers and owls, the male has taken on himself exclusively the care of bringing up the young, when the female was captured; so that this beautiful natural instinct is adapted even to meet accidental and unusual circumstances.

Among some birds, as divers and waterfowl, the male assists in hatching, but does not trouble himself about the young, which, under the guidance of the mother, find everywhere a sufficiency of food ; on the contrary, in most coupled singing birds and birds of prey, and consequently in the case of the heron, the male takes no part in the hatching, but feeds the young, as the mother would be obliged to leave the nest too long if she went in search of food. In singing birds the parents remain long in the neighbourhood of the nest, even when the young no longer need their care. A wag-tail which had hatched a young cuckoo in a hollow oak, through the narrow opening in which the nursling could not escape, even stayed behind from her autumnal migration, and fed the cuckoo in the winter. Thus instinct is adequately modified according to circumstances, and is quite adapted to the wants and mode of life of the animals.

The first act of the mother after the young ones have come out, is to free the nest from the egg-shells, which might easily injure them, nor does she seek their food until this has been accomplished. The birds which live on insects break these up and feed their young with them ; birds of prey just soften the meat in their crop, to make it more easily digestible ; at a later period they lay dead animals before their young, afterwards such as are more or less wounded, and lastly small living animals, so that they may exercise their powers in catching them. Birds living on seeds, as doves, first soak them in their crop, and give them to their young into their beak ; sparrows and others feed their young at first with insects, as if they knew that the grain on which they themselves live was as yet indigestible for their weak stomachs. Thus a pair of sparrows for example, according to Bradley's observations, devoured, at the time they were feeding their young, 3360 caterpillars in a week. They observe strict order in feeding, so that none is forgotten or doubly fed at the expense of another, but each gets his proper share in turn. But as if all these precautions were not sufficient for the preservation of the species, nature comes to the rescue when the young ones are destroyed by birds of prey, and confers on the parents the curious property that, under these circumstances, they can again lay eggs, which otherwise they do not. They then build with unwearied industry another nest, hatch once more, and so repair the loss they had sustained.

And thus we approach the mammalia, at whose head man, the end of the visible creation, is placed ; and here, too, we observe no less striking evidences of maternal care. Conjugal union is here, however, less general than among birds. The young mammalia do not all need the care of both parents, as the mother's milk is sufficient for their earliest wants ; the herbivorous mam-

malia find abundance of food in spring, and the young are soon in a state to provide for their own necessities, and on the approach of danger to take refuge under their mother's protection. But among the carnivora, the young are by blindness and weakness of the limbs for a time confined to the nest, just as we have seen in birds; and how could the mother procure a steady supply of food for herself and her young ones but by constantly leaving the nest and exposing her young to danger. Here, therefore, the male again assists; he exchanges his tiger-like rage for love to his spouse and offspring; one now defends the young while the other goes marauding, and constantly brings in fresh supplies of food.

They, too, make their nest or den, as we remarked of birds, in the most secret places. The lion renders the path to his young imperceptible by frequently running to and fro, or sweeps out its traces with his tail. The male fox constantly drags food for his wife and young ones to his den, but lets no bones lie about, nor does he even rob in the neighbourhood of his abode. The polecat leaves his excreta at a distance, and also carries off those of the young, that the nest may not be betrayed by the smell.

Beavers make their ingenious structures, in which they keep their stock of the necessities of life, before they bring their young into the world. They first replenish their magazines, and both subsist on the stores they have laid up, but so soon as the young are born, the male leaves the supply to his wife, and seeks his own food elsewhere; he does not, however, entirely separate from the female, but visits her frequently.

The special care and arrangement of nature are particularly and strikingly exhibited in the marsupial animals, whose young come into the world prematurely and in a very imperfect state, thus enabling the animals to pair twice in the year; but in this case the young ones are kept in a pouch, as in a nest attached to the mother's body, where in her milk they find food, while the pouch affords the requisite warmth and protection. If the young are sufficiently grown to leave the pouch, they jump in case of danger on the mother's back, and throw their tails round her tail, when she escapes with her beloved burden.

As we ascend in the scale of the creation, we find the passions and inclinations of the animals attain a higher degree of perfection, consequently the traces of reciprocity of love to the parents now begin to be more distinctly manifested. A young walrus does not leave its mother even when she is dead; in a lamb I once observed the most evident disquietude on the death of its mother, whose body it incessantly pawed, as if it wished to rouse and call her back to life, while it clearly exhibited its embarrassment, pain, and uneasiness in its bleating and movements.

Thus a story is told of an old, blind, decrepit rat, which was drawn along by its young ones towards some crumbs of bread, and on the approach of noise was again brought back by them into safety.

The duration of this filial love varies. Mother and young forsake one another when the young can fly, or when the mammal ceases to suck. Among divers the young remain with the mother until the autumnal migration, and only the males travel alone. Among herbivorous animals, where there is abundance of food, this connexion lasts longer than with the carnivora; the large birds of prey drive off their young at an early period to hunt for themselves. With birds or beasts of prey living in the wild state, the connexion ceases in the autumn or winter, when food becomes more scarce. Thus nature arranges and disposes everywhere, and demonstrates her maternal care in unmistakeable language.

My limits forbid me to quote a number of others out of the many examples which occur to me of the care and love of animals for their young; I shall, however, adduce one or two instances to show that these principles exist in several animals in a degree of sensitiveness sufficiently striking to put many a human being to shame.

A cat belonging to a friend of mine had placed her kittens in a cradle; upon which the young ones were taken from her, and the cradle was put out in a pond to be cleaned; shortly afterwards the cat disappeared, and when, after some time, the cradle was again taken out of the water, she was found in it drowned. She had overcome her natural aversion to the water, and had swum to the cradle, where, expecting to save her young ones, she had lost her life. Should we not think such an instance of maternal love in a human being worthy of a statue?

The maternal love of apes is well known. A striking incident related by the distinguished traveller Poeppig, in the account of his voyage to Chili and Peru, may here be introduced in his own words. He says: "What has been told of the extraordinary maternal love of apes is really true, and I have myself been a witness of a proof of it, which for a long time deprived me of any wish to hunt them. In order to obtain a young Coaita ape, which I wished to rear, I had, among one of the densest troupes slowly advancing through the tops of the trees, selected for my aim a female, which carried a tolerably large young one pressed to her bosom. It was long impossible to get near enough to the cunning animal, from which all the others, as if they were aware of the danger, fled away. The first shot wounded her in the hind feet, and compelled her to move more slowly. The second struck more important parts, though without killing her; but it distressed me much to observe, when the animal, as the smoke

slowly passed off, became visible on a slight branch, that at the moment she was aimed at, perceiving the danger to her young, she had rolled herself together over it, and had thus received the entire discharge. Soon the last agony began, but in place of suspending herself, after the manner of the males, by the tail, and so exposing her young to the danger of a violent fall, the dying mother let herself glide down along a creeping plant to a thicker branch, where she cautiously laid down her burden, and immediately after fell dead at my feet. Never since that time have I shot at female apes."*

If we now cast a glance back at what has been stated, who does not recognise in nature the image of a careful mother, who loves all her children with an equal love. In most insects the propagation of their species is the latest object of life, and dying they resign their offspring to nature. Not one of them is forgotten, they are all maternally cared for; the tender caterpillar at its birth finds the young leaf, its food, provided for it, just as the newly-born infant meets with the well supplied breast of its mother. The higher animals indeed take care of their offspring, but in this they are directed by instinct alone; their fury is changed into love, and their timidity into courage, and they become as children in nature's leading-strings. But only man, placed as he is at the head of the scale, can dispense with this guide; he alone can watch for his children and himself, govern and bring them up to higher moral training.

And should, then, man alone, as he comes into the world a weak and helpless child, ignorant of everything, without any other instincts than such as are required for his animal existence, though with a higher destiny, be treated by nature with the cruelty of a stepmother?

No; here too, where all is arranged according to a quite different and higher plan, the beneficent and loving, but more elevated objects of the Creator are drawn for us in well-marked lineaments.

Indeed, I repeat, among the lower animals, nature takes all the care upon herself; here she alone is the true-hearted mother, who provides for all; among the higher animals she resigns to the parents the care of feeding and rearing the young, but retains to herself the direction of the passions and inclinations, and the development of the mental powers and thoughts, which the Creator himself has implanted in every animal, modified according to its wants. In man alone the Creator has left the development and education of both body and soul exclusively to the parents. He has given to the child only capacity and disposition, but to the parents their acquired knowledge and under-

* Poeppig, *Reise in Chili, Peru, und auf dem Amazonenströme*, Band II. p. 236.

standing, excited by parental love, and ennobled by innate moral sentiment, and the consciousness of a higher origin.

Not the animal but man must mould himself, and raise himself to a higher degree of humanity and of moral worth, must perfect himself for virtue and piety, yea, even for immortality. His intellectual powers must be fettered with no bonds of instinct, and therefore is he created without innate knowledge, but at the same time free to develope himself into an independent thinking being, and by his own power and exercise, by exertion and contest between right and wrong, to prepare and form himself for a higher state. For this purpose nature has prolonged as much as possible his youth and pupillary age, to an extent which occurs in no one of the inferior animals, seeing that he has everything to learn, even to his own language, which is given innately to every other animal according to his need. Nor must he be the born servant or obedient slave in nature's leading-strings, but a beloved and free son in the house of his Father, whose image he, and he alone, bears in his bosom. To such great objects, then, is maternal love in man proportioned; she is nobler, higher, her aim is loftier; she contemplates not merely bodily education, but the moral and intellectual development of the spirit; she scatters in her beloved children the seeds of knowledge, of virtue, of piety and love, she leads humanity to the perception of the true, the beautiful, and the good; in a word, her looks extend beyond the grave.

And who that understands and feels this elevated language of the Creator in nature, proclaimed as it is to us with loud voice, can still inquire whether in nature lessons of pure and lofty morality and genuine humanity are preached? How can any investigating and reflecting mind doubt that there is a bible in nature, which is surely written by the Creator himself, and the fundamental text of which is still kept by him pure and inviolate, and in the state in which it issued from his hand?

And should, then, these last and elevated sentences in the book of nature alone prove to be an adulterated text, must we in the innate feeling of a higher moral tendency in man, which can here never attain to perfect maturity, recognise a lie? Has the Creator then implanted in us a deceitful phantom, which points us to higher regions of moral perfection which do not exist? Or has He here placed the cup of immortality and perfection to our mouth, in order, when we have tasted it with our lips, to draw it for ever back from us, when we wish to enjoy it? No! where nature speaks thus, there is no room for falsehood.

The proposition of the excellent Herder is very just, "whether the Creator erred in the object He proposed to us, and in the organization, which for the attainment of that object He so in-

geniously constructed, or whether that object extends beyond our present existence, and this earth is only a place of transit, a school of preparation.* Well does Tollens impressively ask:—

Say, when God came down,
And asked the prostrate earth,
Where her Creator's image,
Most faithfully was shown;
Say what could then be chosen,
Or offered to her God,
Except a tender mother,
Her infant at her breast?

But strikingly as this is expressed, I do not think that which she possesses in common with the beasts can be the true, or most elevated characteristic of a mother.

No; too often have I been the unobserved and silent witness of a nobler spectacle, as I have occasionally with rapture watched an excellent mother, surrounded on all sides by her offspring, who with open ear and eye hung upon her words, sowing the seeds of knowledge, virtue, and piety, and endeavouring to develop more fully the moral feeling, and so to bring her children nearer to Him, from whom she had received all.

And should this be a false, a supposititious case in the book of nature?

Or, where the chisel on a mother's grave has carved the touching words of faith: "Father, here am I, with those whom Thou hast given me, to Thee I thankfully restore them." Could this inscription be a fiction, and heaven so mock the exalted maternal love implanted by itself?

No, mothers! then here be conscious of your high position and lofty calling upon earth. The Creator has taken upon himself the rearing of the animal kingdom, and has guided them with loving care, by endowing them with innate tendencies and instincts, adapted to all their earthly wants. But the reins for the moral formation of man He has placed in the gentle, loving, mother's hand, that under her care and guidance the nobler blossoms of heaven might bud and flourish. Mothers! here you occupy the place of the Most High, for the higher moral development and civilization of the human race He has resigned to the faithful mother's heart, which He had formed for love and piety. Here is then your noblest task and sphere of action, but here you are the genii of mankind, messengers and angels of the Highest, who seeks to guide us to genuine humanity and higher cultivation, to excite in us the sentiment of the true, the beautiful, and the good, to form us for virtue, piety, and love, and so to

* *Ideen zur Philos. der Gesch.*, 1 B. p. 183.

lead us to higher realms, whence every good and perfect gift has descended to man.

If it is then the language of the Creator which we read in the book of nature, where everything bears the mark of the most elevated love and truth, perfection and order, let us, who can penetrate only to the outer covering of nature, gaze with reverential admiration at the wisdom, love, and greatness of the omnipotent Maker, who has created all with the word of His power—"Let these things be."

ART. X.—ON "NON-RESTRAINT," AND THE INCREASE OF LUNATICS.*

IN the treatment of the insane Dr. Morel, the distinguished physician-in-chief of the lunatic asylum of Saint-Yon (Seine-Inferieure), and well known as the learned author of several important works on medical psychology, has very recently published a report of a visit which he made to England in 1858 in order to examine into the system of non-restraint practised in our asylums. To this report he has also added several reflections of great interest on the causes which foster the progressive increase of lunatics in asylums.

It is gratifying, although at the same time we must confess somewhat astonishing and amusing, to read the expressions of admiration and wonder in which Dr. Morel couches his opinions on the happy results of the system of management now, with hardly an exception, adopted in the wards of our public asylums. We were scarcely prepared to find that in this respect we had surged so far a-head of our neighbours, or that the labours of Dr. Conolly, either literary or practical, and their results, had been so imperfectly appreciated across the straits. However, Dr. Morel has now proclaimed himself the Gallic champion of the non-restraint system, and on his shield he has engraved the legend "*Restraints and neglect may be considered as synonymous.*"† Assuredly a more gallant knight never laid literary lance in rest.

"Non-restraint," he writes, "is not a factitious thing, a decoy of the understanding, or a piece of charlatanry, as some opponents have not hesitated to aver, but it is wholly a system of treat-

* *Le Non-Restraint, ou de l'Abolition des Moyens Coercitifs dans le traitement de la Folie, suivi de considérations sur les causes de la Progression dans les nombre des Aliénés admis dans les Asiles.* Par M. le Dr. Morel, Médecin en Chef de l'Asile de Saint-Yon (Seine Inferieure).

† Conolly: *On the Treatment of the Insane.*

ment. I can affirm in my turn that, my peculiar prejudices having yielded to the evidence of facts, I regard *non-restraint* as the highest expression of that which can be realized for the intellectual, physical, and moral amelioration of the lunatics confided to our care. The reason of this may be readily understood. *Non-restraint* is but the culmination of all the improvements which it has been sought to establish in an asylum prior to giving to the patients that liberty which the English physicians have finished by carrying into effect, and which has made their public establishments for the insane models of order and tranquillity.” (p. 37.)

This is no hasty conclusion, for Dr. Morel is careful to tell us that he was not contented to run hastily through our asylums. “I sojourned there,” he writes, “I lived the life of the physicians, and I might say of the attendants and patients. No detail, however intimate, of this life escaped me at any instant, day or night. I was able, at any hour and alone, to go and come, to converse with the lunatics, to witness narrowly how they were cared for and treated; I was, in a word, as free in my movements, as little impeded in my observations, as if I had been in my own asylum at Saint-Yon.” (p. 20.)

But there were certain preliminary questions to be set at rest before it could be accepted by Dr. Morel that the order and quietude of the wards of English lunatic asylums, particularly as compared with those of the French, were to be attributed chiefly to the system of non-restraint.

Might it not be that the English lunatic differed from the French in being less excited and less excitable; that the general paralytic was less violent and disorderly in his acts; that the epileptic was less furious before and after the paroxysms of his malady; that the idiot was less impulsive and less degraded, not manifesting those periodical outbursts of excitement and mischievousness observed in France? Or could it be that the medical service was better organized; that the English physician had at his command better, more zealous, and more devoted agents; or that the natural disposition of the insane to violence and to irritability was tempered by the greater comfort they enjoyed from the kind of nourishment, of clothing, warmth and ventilation—from, in short, all the elements which concur to soothe the morbid activity of the senses and calm the exacerbations of the nervous system?

The question of race is readily dealt with. The frightful state of our asylums before the introduction of the non-restraint system sufficiently proves that the agitation and fury of the lunatic is less dependent upon the temperament and character of a people than has been sometimes thought. “On the other

hand, "the intrinsic nature of a malady such as mental alienation remains always the same." The general paralytic, the idiot, the demented, the imbecile, the epileptic, and the mentally deteriorated of any kind, present in every country the same characteristics; hence this question (if it could be taken into serious consideration) may also be set aside.

We cannot claim any advantage over our neighbours in the medical organization of our asylums, but Dr. Morel believes that the intellectual and moral status of our subordinate agents is higher than theirs. This is doubtless to be accounted for by the superior rate of remuneration given to the attendants in English asylums. The *domestic* arrangements of the wards of our asylums are, it is admitted by our author, in several respects better than those of the French asylums, and it cannot be denied that the maintenance of order and quietude among the insane is in a great degree dependent upon the comforts with which they are surrounded.

In respect to the classification of the insane it would seem that we possess several important advantages. The following observations of Dr. Morel possess somewhat more than a passing interest:—

"It has appeared to me," he writes, "that the English asylums do not serve in so absolute a manner as ours as receptacles for those sad and terrible infirmities and states of degradation of our species that I am about to mention. In the asylums that I visited I found fewer general paralytics, fewer instances of senile dementia, and scarcely any idiots and imbeciles. The number of epileptics was also less. On the other hand, the asylums that I saw in England were exclusively devoted to the indigent; lunatics of the wealthier classes being placed in particular institutions. This fact alone indicates, then, that a selection is exercised among the insane who are secluded in the great English establishments. These institutions do not receive, for example, those degraded natures, instinctively malicious, a singular melange of perversity and insanity, who are sent from our prisons to our asylums, but who in England remain in the places where they were primarily lodged, especially when the individuals have been guilty of murder, incendiarism, robbery, or other crimes. But it must not be concluded from this that the insane received into English asylums are all models of calmness and gentleness, and that, from the nature of their temperament, they are predisposed to live without a strait-jacket.

"From what I have said of the relatively less number, in English asylums, of idiots, imbeciles, the demented from age, and the degenerated of every species which encumber the French asylums, it ought not to be inferred, however, that England in this respect is more favoured than we are. The conclusion could not be sustained in presence of statistical records, or even of the general study which I was enabled to make, although in a very imperfect manner, of the physical

and moral perturbing causes existing in the United Kingdom. There, as in France, these causes act with very great intensity, and produce in like manner insanity, as well as all those degradations of human nature which are the consequences of that action, and which, in my *Treatise on Degenerations*, I have designated by the term *unhealthy varieties* (variétés malades) in the human species

“ It may be demonstrated that the number of lunatics confined in the asylums of the countries I have mentioned (England and Wales) is far from representing the mass of those who exist in reality. I suspect, although it might be difficult for me to attest this positively, that it is not always either the most troublesome by their turbulence, or by their congenital or acquired infirmities, or the most dangerous by the nature of their acts, who are secluded in the asylums. There exists, in fact, in England an incontestible tendency to establish categories, and not, as with us, to suffer a confusion of so many clashing elements which renders it so difficult to maintain order and discipline in an establishment for the insane, as well as to apply an exclusive system, which sets aside every means of coercion, in order to maintain and reform so many dangerous natures. This method of classification is it preferable to the system of isolation which chiefly exists in our country, and will there not come a period when the imbeciles and idiots and all that which may be called the *caput mortuum* of alienation, will in England, as in France, force the gates of the asylums and still further increase the sad over-crowding which exists in the greater number of those establishments ?” (pp. 21-23.)

Admitting that we possess the tendency here attributed to us by Dr. Morel, of separating the unsound of mind into certain categories and providing for these categories apart the one from the other ; admitting, also, that this tendency facilitates the adoption of measures calculated to promote order and discipline in an asylum ; still, notwithstanding this advantage, and the advantages possessed by the greater degree of domestic comfort in our asylums, as well as by the better class of subordinate agents employed in them, yet there was a wide margin of amelioration to be accounted for, and which was to be attributed to the English system of non-restraint. To this, as we have seen, Dr. Morel does full justice.

Dr. Morel’s observations on the absence from our asylums of those classes of persons of unsound mind who form a permanent source of many social mischiefs, and who, indeed, constitute the chief source of those social evils which have their origin in lunacy, are of very grave interest. The opinions of Dr. Morel upon this subject confirm a belief we have long entertained of the inadequacy of our great asylums, and present asylum system, to affect permanently for good the fostering causes of lunacy in the country. Our great asylums are simply receptacles for the amount of insanity which is thrown promi-

nently up to the surface of society, and their influence as curative institutions is of the very weakest. Strive as we may, our efforts are insufficient to meet even the ordinary requirements of the country for known lunacy alone; and we are compelled, against our own will, to make use of our *workhouses* as lunatic receptacles, notwithstanding that in so doing we know that in several important respects we promote the evil we are seeking to ameliorate. In fact, we go on from year to year dealing in an empirical manner with so much lunacy as is forced upon our attention, but caring not a whit to seek from whence it comes. We act, indeed, somewhat in the fashion of the ingenious peasant, who, knowing that the roof of his cottage is somewhat dilapidated, and that it affords but an imperfect protection from the rain, is content to bring into use every vessel that he may have, good, bad, or indifferent, to catch intrusive streams of water, but never dreams of ascending to the roof and seeking for the inlets of the streams, and so stopping the mischief at its source. It would be folly on our part to waste time in the utterance of regrets that the great and almost sole means we possess of obtaining an accurate account of the status of lunacy in this country, and a firm basis of inquiry into the fostering causes of lunacy among us, should have been, in the past year, again neglected. We allude to the Census. It has been definitively decided that insanity shall have no part in this national inquiry now once more close at hand. This omission we can only explain upon the supposition that neither the Government nor the people are as yet sufficiently awake to the important national and social interests involved in the subject. We had thought that the mere questions concerning the enormous and increasing expenses for the maintenance of lunatics, the insufficiency of the means provided for their care, and the growing difficulties experienced both administratively and pecuniarily to meet even the most immediate requirements, would have been sufficient, apart from any other considerations, to show the importance of ascertaining fully the present and prospective difficulties with which we had to cope. We had thought, indeed, that if all the items of the problem to be solved were known, a solution might be perhaps more satisfactorily and certainly arrived at. We erred, however, in opinion; but our course lays still plain before us—to wit, to seek by all means in our power to arouse a greater interest in, and attention to, not merely the financial evils (so to speak), but also, and above all, to the great moral and social evils arising from lunacy. Lunacy is something more than a mere disease to be looked at from a purely medical point of view. It is a sad but true index of the activity of those causes which most impede the onward progress of civilization, and

which form the bane of that progress. It is, moreover, but a more defined state of intellectual and moral deterioration, the lower grades of which are disseminated widely among society. Upon the influence which we can exercise upon these lower grades will, in the end, depend our ultimate hopes of diminishing the amount of lunacy among us.

Dr. Morel's conclusions concerning the increase of lunatics are of great interest:—

"The progressive augmentation of lunatics in our asylums," he writes, "is not indefinite, and a moment will arrive, in the evolution of the causes of deterioration of the human species, when the evil will be modified by its own excess."

And this is the mode in which the evil will work its own cure—a cure, however, which it is not too improbable to surmise would be contemporaneous with the decline of a race or nation. "A great number of individuals, congenitally stricken with alienation or mental imbecility, would disappear from the world in consequence of their slight viability and their want of all power to propagate. A number not less considerable, sad to say, will spare the administration the expense of maintaining them in an asylum by committing suicide." Elsewhere (p. 95) our author writes:—"In France the number of suicides, according to statistical records, amounts to nearly 3000 individuals of both sexes, and (this is an incontestible truth) four-fifths of these unfortunates are lunatics."

The practical conclusions following in order after the foregoing, although intended especially for France, do not fail in interest for us:—

"Notwithstanding the enormous sacrifices which are required of towns and districts in consequence of the admission of a multitude of idiots, imbeciles, or demented persons into our asylums, it is undoubted, setting aside even those humane principles which ought to guide us in such a matter, that the sequestration of these beings is less incommodious or dangerous, and is more in the interest of society, than if they were left at liberty or in charge of their families." Dr. Morel points out that idiots, imbeciles, and the intellectually degraded of every kind, including cretins, are not usually regarded as dangerous. But daily observation gives the lie to this opinion. The erotic instincts and the propensity to vagabondage found among these unfortunates need alone be cited in illustration.*

* See for examples of the evils arising from erotic instincts and vagabondage of idiots and imbeciles, the *Supplement to the 12th Report of the English Commissioners in Lunacy*, and the *Appendices to the 1st and 2nd Reports of the Scotch Commissioners in Lunacy*, also the *Journal of Psychological Medicine*, vol. xii. pp. 344-347; vol. xiii. pp. 392-394.

"The idea that has often been expressed of placing idiots, imbeciles, and the demented in special establishments would augment the expense of administration, and would, up to a certain point, be prejudicial to science, scattering abroad the elements necessary to favour our studies upon the causes which produce alienation and the degeneration of the human species.

"But, as the study of these causes has already revealed the predominance of forms complicated with paralysis and dementia, and which constitute the states of congenital debility, with production of instincts more or less dangerous, it is evident that the new architectural conditions of our asylums ought, in future, to be in relation with the greater frequency of the degenerated states that I have mentioned.

"Without estimating the economy that these new architectural conditions would lead to, since their character would have relation to the exigencies of a rural life, they would also tend to secure more promptly the different needs of the service, to establish a more decisive line of demarcation between the categories so widely separated by their instincts, their manners, their habitudes, and the dissimilarity resulting from different lesions of the nervous system. They should especially (better than has been hitherto done) preserve patients who are boarders from contact with the indigent. This is with families a subject of incessant complaints, and recriminations and regrets more or less legitimate.

"When it has been universally admitted that the imperfect beings of whom I speak cannot be cared for at home without imposing upon families sacrifices above their strength, and that, on the other hand, it is impossible, without the greatest danger to these kinds of infirm patients and to society, to leave them at liberty, it will be necessary to resolve to place them in asylums to be established in every district." (pp. 99—100.)

We shall leave these conclusions to tell their own story; but there is a lesson to be learned in medical observation from Dr. Morel's report, too good to be passed by unheeded. In a letter addressed to the Prefect of the Seine-Inférieure, Dr. Morel points out the importance of instituting an inquiry, based upon statistics, into the state of lunacy and allied conditions of intellectual and moral deterioration in the department, and he suggests a form of inquiry.

"—The greater or less frequency of insanity and of the diverse degenerations of the human species in this or that country are always in relation with the greater or less frequency of the perturbing causes of physical and moral health of the inhabitants of the country. The programme to be followed, in order to study well the consequences of these causes, may be summed up in the following questions:—

“What is the morality of the inhabitants within a certain boundary? To answer this question it will be necessary to know the number of illegitimate children, and those of crimes against the person and against property. It will be needful also to estimate the suicides, the extension of prostitution, the amount of natural and accidental deaths, &c.

“What are the food and hygiène of the inhabitants? What are the predominant maladies within this or that boundary? What influence is exercised by the industry, the manner of living, the nature of the soil, and the kind of its culture upon the habits, the temperament, the morality and the physical health of the individuals? What are the most frequent causes of exemption from conscription?

“3. What is the state of primary instruction in each of the communes? What, in the departments, are the most ordinary causes of intellectual excitability and of moral emotions?

“4. What is especially the proportion of drunkenness, and what is the quantity of alcoholic drinks consumed? What effect has this deadly habit of drinking upon the sterility of woman, upon the viability of infants, upon vagabondage, upon criminal precocity, upon congenital idiocy and imbecility, &c.?”

It will be seen at a glance that many of the more important of these data with us are furnished by the Registrar-General's Reports, the judicial statistics published by the Home Office, the returns of the Poor-Law Board and the Board of Trade; but much would still be wanting. Until, however, we have a better knowledge than we now possess of the status of insanity among us no systematic inquiry in this country or in any district of it (as a rule) would be practicable.

Before closing Dr. Morel's report we would note that he has thought it necessary incidentally to defend himself from an imputation of elevating the merits of Dr. Conolly at the expense of Pinel. In defending himself from this charge, he writes, “If the idea of reform *apropos* of the insane appertains incontestably to Pinel, it does not follow that those who have carried into effect a method so salutary as that of *non-restraint* have not also introduced a novelty in the asylums over which they had control. The idea of Pinel contained in germ everything that has been effected since; but it was not sufficient to break the chains of the insane; it was requisite to attain a more complete realization, a more general application of this humanizing idea. Now, it seems to me that the English physicians have taken this course, although I do not overlook certain exaggerations which I am far from approving, but which are inseparable from the excitement of working out any idea of reform.” (p. 39.)

ART. XI.—REASON, GENIUS, AND MADNESS.

NOT long ago a French physician of note, one upon whose opinions medical psychologists had long been accustomed to look with respect, gave to the world a work,* the object of which was to prove that *genius* and *insanity* were so closely allied, that they sprang from the same stock, were twin branches upon the same tree. *Genius*, in short, according to this author, was, as insanity, a morbid affection of the nervous system—"a *neurosis*," as he expresses it; both the one and the other were developed by the action of the same series of causes, and such difference as existed between them was one of degree and not of essential character. This strange paradox was supported by an amount of ingenuity, learning, and actual observation, which can only be rightly appreciated by a reference to the book itself. Nay, so well is the book written, that the reader is almost compelled to exclaim, parodying the scene in the celebrated consultation on *Monsieur de Pourceaugnac*, when the second physician expresses his admiration of the skilful diagnosis and prognosis of the senior physician:—"The arguments you have advanced are so learned and beautiful, that it is impossible that one should be a genius without being a madman; and if it were not so, it ought to be so, from the excellency of the things you have said, and the justness of your reasoning."†

At the time when the work was published, we devoted some attention to it,‡ and endeavoured to show that the theory advocated was but a new version of a very old story; and that when stripped of all extraneous matter, and reduced to a simple question of the signification of terms, the proposition that genius was a *neurosis*, was no better than a play upon words, such, in reality, as that by which Touchstone routed the straightforward reasoning of the clown, and which may be aptly paralleled by an ingenious gastronomical paradox, which finds a place in the pages of the welcome almanack for the present year of our respected contemporary *Punch*:—"Buck-venison is the best for venison-pasty, although the pasty is made of dough."

If we return to the subject of M. Moreau's work now, it is

* *La Psychologie Morbide*. Par Dr. J. Moreau (de Tours). Paris. 1859.

† Act i. Sc. I. sc. xi.

‡ See article "Paradoxical Psychology," *Journal of Psychological Medicine*, vol. xiii. p. 1.

because the book has derived an additional interest from the fact of Professor Flourens, having deemed it worth while to prepare and publish a species of antidote against it in the form of a small octavo volume.

"There are men," wrote Leibnitz, at the commencement of the last century, "who believe that it is witty to declaim against reason. . . . I see little books and trifling disquisitions, in which this notion is made much of, and sometimes even I see verses much too beautiful to be devoted to such false thoughts. In truth, if those who mock reason speak in good faith, this would be a new species of extravagance unknown in past ages." But, now-a-days, remarks Flourens, commenting on this passage, we do not restrain ourselves to mocking reason merely ; we go far beyond this. We produce voluminous and learned works to prove that genius is a malady. Let us add, lest it should be imagined that M. Moreau's theory applies only to the exceptional intellectual manifestations usually classed under the term genius, that so far from this being the case, the time-honoured maxim "*mens sana in corpore sano*" of necessity falls to the ground, the theory being accepted. "This maxim," writes the last-named writer, "is no longer true : it is requisite to assert precisely the contrary. In truth, if the normal state of the organism accorded generally with the regular action of the thinking faculty, we should never see in this case, or only exceptionally, the intelligence become elevated, as well in its affective as in its intellectual relations properly so called, above an honest mediocrity. In these conditions, man might be endowed with a sense of justice, with a judgment more or less sure, with a certain degree of imagination ; his passions would be moderate ; always master of himself, he would practise better than any one the doctrine of self-interest ; he would never become a great criminal, but he would never become a great man : he would never be attacked with that *mental malady* called *genius* : in other words, he would never, under any circumstances, be ranked among privileged beings."†

Well may M. Flourens dread the loss of all human dignity if this theory were to be established. The "if," however, in this case is of most portentous dimensions. A paradox which contains its own refutation within the space of the words in which it is expressed, can have little chance of being recognised even transitorily as a scientific truth. Yet for all this it will have charms

* *De la Raison, du Génie, et la Folie.* Par P. Flourens, Membre de l'Académie Française, et Secrétaire Perpetuel de l'Académie des Sciences (Institut de France). Paris. 1860.

† *La Psychologie Morbide*, p. 468.

for many ; and M. Flourens was right when he thought that the appearance of M. Moreau's work bespoke the necessity for a brief and authoritative recapitulation of the great and undoubted signs by which we recognise reason, genius, and madness. This M. Flourens endeavours to effect in the work we have referred to. There may be vast and imperfectly, or altogether unexplored tracts of country between the different beacon-lights, but he who steadily guides his course by these lights will never be led far astray by a Will-o'-the-wisp, or look long upon dense banks of fog as solid ground, or be deceived by the fantastic delusions of a mirage. He may, for the moment, mistake the flitting fire of the *ignis fatuus* for the blaze of the true beacon ; his true course may be hidden in the fog, or, deluded by the mirage, he may think that he sees close at hand and within easy reach the goal at which he aimed ; but *if* he be always on his guard, always advance doubtingly when the beacon is hid, and be heedful when the light is in view, there is little fear of his plunging deeply into the slough of mental paradoxes.

"I examine successively in this book," writes M. Flourens of the work before us, "*reason*, the supreme gift of GOD to man ; *genius*, the highest expression of that reason ; and *madness*, which is nothing else than disorder of our ideas, a disorder which is not *fatal*, and against which the energetic attention of our proper spirit upon itself will always be the most salutary curb."

We do not propose to follow closely M. Flourens' arguments and statements, but simply to dip here and there into his work, selecting one or two illustrations of the manner in which he deals with his subjects.

Terminating his analysis of M. Moreau's work in the section devoted to *Genius*, he writes :—

"In conclusion, I define *genius* a superior reason ; and the author defines it as *neurosis*. Definitions are free. But what is the precise fact, what is the characteristic fact of *genius*? It is that it sees, it judges, it approves, it blames, it corrects : this is the certain mark of reason. And what is the precise fact, the characteristic fact of insanity? It is that it cannot either see, or judge, or blame, or correct. These are no longer words, but trenchant facts.

"Socrates and Pascal are continually cited. Socrates believed that he *saw* [heard] a familiar demon ; Pascal believed that he *saw* a precipice open under his feet. Both Socrates and Pascal had these hallucinations. But what does this prove? Does it prove that the *hallucination* was genius, or that it produced genius ; that without his *hallucination* Socrates would not have possessed his good sense ; that without his *hallucination* Pascal would not have had his great mind? Can we not see that all these relations between genius and insanity are

but exterior relations, occasional and fortuitous; that they are not *necessary* relations, and that the whole question rests there?

"Every error concerning the nature of things depends upon a fault of analysis. 'I wish that analysis were not bounded,' said Leibnitz. A restricted analysis leads to superficial analogies. A full and entire analysis alone goes to the bottom of things, and sees there the profound distinction which separates *genius*, that supreme power of discerning and seizing the truth from *insanity*, that fatal illusion which gives to the false—that is to say, to that which does not exist—a kind of being." (p. 116.)

Hereditary transmission is the mysterious key with which M. Moreau unlocks the chief difficulties which beset his theory. M. Moreau avers that we are born mad: the primitive and genetic fact of insanity, according to him, is hereditary transmission. Heritage being laid down as a principle, "fatality," M. Flourens states, "follows as a consequence." "When," writes M. Moreau, "in the progenitor of an individual we see the mechanism of innervation diversely modified, injured, and altered, vitiated, indeed, in every way in all its modes of manifestation, functional, dynamic, and organic, it is easy to recognise the kind of pathological fatality of this individual."

"*Hereditary transmission and fatality*," observes M. Flourens, "are the two dominant points of the whole system." M. Moreau yields but an insignificant place to acquired insanity. On the assumed fatal consequences of hereditary transmission, "or, as we may say, in one word, *the fatality of heredity*" (a coinage convenient to use, as we must have recourse to *inneity*—*innéité*, *hérédité*), M. Flourens has some interesting observations which we shall not hesitate to cite, although they may be somewhat lengthy:—

"M. Moreau exhibits *heredity* as a *simple fact*; he deceives himself, it is a *double fact*; a fact *primitive* and a fact *secondary*. Before there were madmen, there were men. Before *heredity*, properly so called, there was *inneity*. Before the immediate parent, there was the general parent, humanity.

"There are in the animal economy, such as we know it at this day, after so many ages of successive generations, two orders of *qualities*—the qualities *innate* and the qualities *acquired*, the qualities *primitive* and the qualities *secondary*, the qualities *essential* and the qualities *accessory*. 'The imprint of each species,' writes Buffon, 'is a type of which the principal traits are graven in ineffaceable and permanent characters for ever, but all the accessory touches vary; no individual perfectly resembles another, no species exists without a great number of varieties. . . .'

"I call those qualities *innate* with which each species has been endowed from its first formation, its *creation*. Dating from its first formation, from its *creation*, the *essential* qualities of each species have

remained the same. The lion of to-day is the same as that of the time of Aristotle; the ibis of to-day is the same as that of the time of the Pharaohs. M. Cuvier found the real elephant* more exactly described in Aristotle than in Buffon; no species has changed; the *type* of each persists, and remains immutable. More, when some of the *accessory* qualities have been modified, either by the influence of climate, of food, or man, more powerful to that end than all the other causes together, it is but needed that the extraneous cause should cease to act, and the acquired modifications disappear, and the original character return.

"A decisive experiment to this effect has been made upon a grand scale. After the conquest of the New World, the Spaniards carried there their domestic animals, the horse, the dog, the pig, the ox, the goat, &c. These animals having been restored to their primitive state—that is to say, to freedom—have lost all their characters of *race*, and have retaken their characters of *species*.

"The horse has returned to his natural size, which is about that of the ass; his original colour, which is dark bay; his instinct to live in troops commanded by a chief, &c. The dog has returned to his proper size, that of the jackal; his instinct to burrow, to pursue game in concert, and his ears have become straight; he has also returned to his howling, and ceased to bark, which was the fruit of his relations with man, &c.; the hog has become there a wild boar, and the porker is again clad in his primitive livery.

"The *innate* qualities have then, as compared with the *acquired*, this advantage, that they are permanent and fixed; that hidden on the surface, they survive in the deeper beds, always ready to rise up anew and retake the empire, when the *acquired* qualities no longer find in exterior circumstances the borrowed aids which were requisite to maintain and reproduce them.

"It is of organs as of faculties. We cannot cause the loss of an organ. I removed from hares, dogs, mongrels of the jackal and dog, field mice, the supra-renal capsules, the tail, the ears, the spleen, the thyroid body, and this during four, five, and six generations successively. At each new generation, the organ has been unquestionably removed from each couple—from the male and female, from the father and mother, and the progeny have always re-produced supra-renal capsules, tails, ears, spleens, and thyroid bodies.

"The scholastic axiom mooted with so much satisfaction by our author, 'that no one can give that which he does not possess,' does not hold good here. The father and mother without spleen have, notwithstanding, given their young ones that organ; the tailless father and mother have given their young ones a tail; and the earless father and mother have given their progeny ears.† What a phenomenon! what a mystery! And what proof could be more certain of

* The Asiatic elephant, the only one known to Aristotle.

† In physiology, the term *congenital* variation is applied to the changes produced spontaneously, which arise from birth: these alone can be transmitted, and form a *race*. *Accidental* variations (*mutilations*) are never hereditary.

this primitive and ever-substisting power, which tends to bring back without ceasing the things of *primary institution*, of *creation*, and to correct and eliminate vicious things, changed by subsequent generations?

"This power of nature, of *recall* (if I may so phrase it), to things of *institution*, of *formation*, of *origin*, is the first resource of the organism against the *fatality of heredity*.

"And there is still another matter arising even from *heredity* itself.

"M. Moreau insists much, and rightly, upon 'the influence [it is he who speaks] of marriages effected against the laws of a healthy physiology.' And here what a path he opens to delicate and judicious medications!

"Nothing is better known than the art of producing, among our domestic animals, smaller or greater races. By uniting together at each generation, smaller and still smaller individuals, in the end are produced those little pet-dogs, 'which,' remarks M. Cuvier, 'are the most degraded products, and the strongest indication of the power that man exercises over nature.'

"I have begun an inverse series of experiments. I propose to obtain the greatest individuals that the two species of the wolf and the dog, united together, can give rise to. At each generation the greatest males are united with the greatest females. At the end of three generations, enormous and extremely ferocious animals were obtained.

"I say *extremely ferocious*; and this is a trait to be noted here, because that which is bad in the organization is transmitted and increased by assorted combinations, as well as that which is good.

"Bad races may be engendered as well as good; the bad, indeed, are more quickly obtained than the good *Heredity* then causes, by turns, good and evil. It ameliorates, it deteriorates, it vitiates, it perfects, according as the series of generations is well or ill-conducted; the whole secret is in the art of *assorted combinations*.

"But, putting aside this art, all *human*, of *assorted combinations*, and looking to nature alone, we see that, at the bottom, the species remains always the same. 'The species will be always new,' Buffon has said. 'To the eyes of the man who judges grandly and generally,' he again says, 'the one thousandth animal in the order of generations is the same as the first.' And he confirms, enlarges, and illumines his reasoning by a beautiful image. He places, by a philosophical fiction, the *species* in the place of the *individual*.

"'Let us place,' he writes, 'the species in the place of the individual; we have seen what the spectacle of nature was for man; imagine we what the view would be for a being who represents the entire human species. . . . Man, he continues, coming into the world, comes into darkness: the soul as naked as the body, he is born without knowledge and without defence; he brings with him only passive qualities; he can but receive the impressions of objects, and suffer his organs to be affected; the light burns long before his eyes before enlightening them: at first he receives everything from nature, and returns nothing to it; but when his senses are strengthened, when he can compare his

sensations, he throws himself back towards the universe; he forms ideas, preserves them, comprehends them, combines them. Man, and especially instructed man, is no more a simple individual; he represents in great part the entire human species; he has commenced by receiving from his fathers the knowledge which had been transmitted to them by their ancestors; these, having discovered the divine art of tracing the thoughts and of giving them to posterity, are, so to speak, identified with their nephews, ours identify themselves with us; this re-union, in a single man, of the experience of many ages, removes to infinity the limits of his being; he is no more a simple individual, bounded, as others, to the sensations of the present moment, to the experiences of the actual day: he is almost the being that we have placed in the position of the entire species; he reads in the past, sees the present, judges the future, and in the torrent of time, which reduces, carries away, swallows up all the individuals in the universe, he finds the species constant, nature invariable: the relation of things being always the same, the order of time appears to him nothing; the laws of renewal, in his eyes, only compensate those of permanence; a continual succession of beings, all similar the one to the other, is equivalent in effect to the perpetual existence of one of these beings alone.'

"From this brilliant fiction let us return to facts. The novelty of the species is then eternal. And how does this come to pass? Because each new generation is as a new effort towards the *restitution*, towards the *reparation* of the species; because there are two orders of qualities, as I have already said, the *essential* and the *accessory*, the *innate* and the *acquired*, the *primitive* and *healthy*, the *secondary* and *vitiating*, and the inherent force of the organism tends without ceasing to reascend from the one to the other: from the *acquired* to the *innate* qualities, from the *accessory* to the *essential*, from the *secondary* to the *primitive*, and from the *vitiating* to the *healthy*.

"Thus much for *heredity*.

"*Heredity*, explained, leaves no place for *fatality*. *Destiny* no more exists than *chance*. *Destiny* and *chance* are two words which have never indicated more than one thing: ignorance of causes. 'Destiny neglects causes,' remarks Liebnitz; and, long before him, the poet Virgil, that other great philosopher, had said:—

" 'Felix qui potuit rerum cognoscere causas,
Atque metus omnes et inexorabile fatum
Subiecit pedibus ' " (p. 12.)

If this quotation be lengthy, we would claim for it, apart from its intrinsic merits, the advantage of being an excellent example of the method in which M. Flourens treats the subject-matters of his book. Hereditary transmissions has of late, moreover, been a subject of so much familiar as well as scientific gossip (if we may so speak without offence), that the popularized opinion of the distinguished Perpetual Secretary of the

Academy of Sciences on the question possesses an interest altogether foreign from the immediate object of the writer.

We shall simply refer to one subject more in M. Flourens' work. "And, now," he asks, when summing up the section of the book devoted to *Genius*, "what is genius?" This is the reply:—

"It is the power, carried to the highest degree, of thinking justly and of seizing the truth."

"In every mode of life there are routes which lead to the truth."

"The man of genius is he who opens these routes." (p. 165.)

This admirable view of genius would alone checkmate M. Moreau.

M. Flourens' work is throughout most pleasant reading, and will undoubtedly be most widely read. The antidote, indeed, if we err not, will be made use of from its very gratefulness, where the bane has never reached. On those points of the book, chiefly secondary, which we think are open to criticism, we shall offer no remark. We have read the book with reference to its main object, and would recommend others to do the same.

The more we reflect on M. Moreau's theory, the more untenable does it appear to us. M. Moreau must pardon us, but we know no parallel to it except it may be (in kind, at least,) the opinions of the worthy physicians who visited M. de Pourceaugnac. The unhappy man of genius, or individual whose intellect chances to be raised a little above a stagnant mediocrity, holds much the same position towards M. Moreau that the unfortunate gentleman in Molière's comedy did towards the two physicians. M. Moreau's theory has a most insatiable maw.

"The least eccentricity," truly writes M. Flourens, "the most insignificant trait of apparent foolishness or distraction, the most simple emotion, and, if I may say so, the most reasonable, a nervous disorder, whatever it may be, the least suspicion of rachitis, all these things are accounted as so many accusing proofs of a manifest *consanguinity* with insanity."

Thus it happens that there figure upon the author's (M. Moreau's) list [of facts illustrative of his theory]:—Newton, because he was seized with despair at the sight of his burning manuscripts; a despair very natural when we reflect on the character of those manuscripts: Malherbe, because he had a *very disagreeable vice of pronunciation*; Leibnitz, "because his niece," (it is the author who writes,) "who was his heir, having found, after the death of her uncle, sixty thousand ducats in a box under the bed, died on perceiving them, not imagining, says Zimmerman, that a philosopher would possess money." "Turenne, because he *stammered*, and shrugged his shoulders

from time to time while "speaking." Bossuet, because his head ("that head so vigorous," as the author well says.) was all at once disturbed, when he was given to understand that he must undergo the operation for stone. Montesquieu, because towards the end of his life he *was struck with blindness*; Cuvier, *because he died from an affection of the nervous centres*; Talleyrand, because he had *club-foot*; Napoleon, because he was *round-backed*. "A painter, who had very often the opportunity of seeing and observing the emperor, has remarked to me that he had an excessively arched back, or, as we vulgarly say, he was round-backed (*le dos rond*)." (p. 114)

We read in Molière how, after the victimized but sane M. Pourceaugnac had been pronounced to be mad by the physicians, everything that he did or said was set down by them as a further proof of his madness. After the unfortunate gentleman had submitted long and patiently to the flood of technicalities, in which the learned doctors expounded their opinions of his intellectual state, he exclaimed (Act i. Scene xi.):

M. de Pourceaugnac.—Gentlemen, I have listened to you for an hour: are we acting a Comedy?

First Physician.—No, sir, we are not acting.

M. de Pourceaugnac.—What is all this? What do you mean say with your galimatias and fooleries?

First Physician.—Good! he becomes abusive! This confirms our diagnosis: the malady may pass into mania.

M. de Pourceaugnac.—With whom am I placed here? (*He spits two or three times.*)

First Physician.—Another diagnostic: frequent sputations.

M. de Pourceaugnac.—No more of this; let us leave the place.

First Physician.—Another still: restlessness.

M. de Pourceaugnac.—What does all this mean? and what do you wish?

First Physician.—To cure you, according to the order given to us.

M. de Pourceaugnac.—To cure me?

First Physician.—Yes.

M. de Pourceaugnac.—Parbleu! I have nothing the matter with me.

First Physician.—A bad sign when a patient does not feel himself ill.

M. de Pourceaugnac.—I can tell you that I am quite well.

First Physician.—We know better than you how you are; and we are physicians who understand perfectly your constitution.

M. de Pourceaugnac.—If you are physicians, I have done with you; I laugh at physic.

First Physician.—Oh! oh! this man is madder than we thought.

We feel as if we were exercising a species of righteous retribution in turning a portion of Molière's bitter satire upon M. Moreau's theory, as Molière's name appears among the list of those men of genius who are cited by M. Moreau as illustrations of the truth of his theory. Molière "suffered from convulsions," writes

M. Moreau. "The least check, the least disorder, brought on convulsions, and prevented him from working for fifteen days."

We have not the moral courage to resist the quotation, as a tail-piece to this article, of the song of the two physicians in Act I. Scene xiii. of *Monsieur de Pourceaugnac*, and which almost immediately follows the scene from which we have just quoted. In this song the doctors prescribe the moral treatment of their patient. We chance to possess a very clever and close translation of the song by the learned translator of the latest English version of Dante,* the Rev. J. W. Thomas.

Of the two chief means to be employed in the intellectual treatment of the insane, "the second," writes M. Flourens, following Lauret, "is to occupy the mind vigorously and assiduously with ideas entirely opposed to those which torment the lunatic." Now, M. de Pourceaugnac was pronounced to be suffering from hypochondriacal melancholy; what, therefore, could more fittingly fulfil M. Lauret's second method "of turning, at any cost, the insane from his mad ideas" than the prescript following?—

LES DEUX MÉDECINS

Buon dì, buon dì, buon dì,
Non vi lasciate uccidere
Dal dolor malinconico,
Noi vi faremo ridere
Col nostro canto armonico;
Sol per guarirvi
Siamo venuti qui
Buon dì, buon dì, buon dì.

PREMIER MÉDECIN.

Altro non è la pazzia,
Che malinconia.
Il malato
Non è disparato,
Se nol pigliar un poco d'allegria,
Altro non è la pazzia
Che malinconia.

SECOND MÉDECIN.

Sù, cantate, ballate, ridete;
E, se far meglio volete,
Quando sentite il deliro vicino,
Pigliate del vino,
E qualche volta un poco di tabac.
Allegramente, monsu Pourceaugnac.

* Or rather, we should say, of the *Inferno*, the translations of the remaining portions of the Divine Comedy not having yet appeared; but the *Purgatory* is, we believe, announced for publication. Mr. Thomas's translation of the *Inferno* must rank, at least, as one of the two best translations in the English language, and it has the rare merit of being rendered in the triple rhyme of the original.

Reason, Genius, and Madness.

THE TWO PHYSICIANS.

Good day, good day, good day!
With melancholy grief
Yourselves no longer slay,
But laugh and find relief
In our harmonious lay.
We come but to cure you,
And health to ensure you.
Good day, good day, good day.

FIRST PHYSICIAN.

'Tis madness to give place
To melancholy :
In the worst case
Despair is folly
If you'll but take heart and be a little jolly,
'Tis madness to give place
To melancholy.

SECOND PHYSICIAN.

Up then, and sing, be laughing and dancing :
Still better health if you design,
Whenever the mad fit you feel advancing,
Just take a glass of wine ;
With pipe, too, sometimes you may puff away :
So pr'ythee, Monsieur Pourceaugnac, be gay.

In Memoriam.

(ROBERT BENTLEY TODD.)

GREAT professional distinction naturally attracts the notice and admiration of all who witness it. The merits, the talents, and the qualifications that have secured remarkable success, must possess personal interest for those aspiring to a similar position. The education, the friendships, the pursuits of every man who achieves pre-eminence, are anxiously investigated by many who seek in them the motives by which his conduct was actuated, and the secret whereby the summit of ambition may be attained.

Professional life, its triumphs and failures, its duties and responsibilities, its joys and sorrows, acquire solemn interest when illustrated by the career of one who has recently left its scene. While the recollections of friendship are fresh, it is difficult to preserve to their scrutiny a strictly impartial judgment. Inasmuch as a future age will be eager in its inquiries concerning men who have exercised an influence on professional councils, and held a high place amongst professional brethren, it is befitting that their cotemporaries should adequately estimate the singular assiduity, indefatigable industry, and rare ability, by the persevering exercise of which any individual has been regarded as able, useful, and eminent.

The last year has been marked by the death of many great and justly-distinguished men, whose names, renowned in the councils, or proved in the defence of their country, are numbered with those whom posterity will delight to honour. Their deeds remain to be chronicled in the history of their time.

It is our sad privilege to investigate a career of equal utility though of less ambition, and to point specially to one on whom distinction was conferred by talent and experience in a profession to whose keeping is entrusted much of the comfort and happiness of social life.

ROBERT BENTLEY TODD, whose writings we have frequently quoted, sometimes in terms of dissent, always with respect, was the second son of Charles Hawkes Todd, Professor of Anatomy and Surgery in the Royal College of Surgeons in Ireland. A marble bust in the great hall of that institution, testifies by a suitable inscription, the esteem in which his father was held. His sudden death at the early age of forty-six years, in the zenith

of professional fame, before it had eventuated in the acquisition of fortune, seriously affected the prospects of his youthful and numerous family. Robert Bentley, his second son, was originally designed for the bar, and had, while completing his undergraduate course in Trinity College, kept the terms required in the Dublin Inns. The great calamity of his father's death, while it prevented the further carrying out of his intentions in this respect, at the same time aroused on his behalf the sympathies of numerous friends, who urged his adoption of the medical profession as offering, in his altered family circumstances, greater facilities for the acquisition of an immediate income, and for the obtainment of practice on which he would enter with unusual advantages. Acting on their advice, Mr. Todd abandoned his original intention, and commenced medical and surgical studies with a mind well schooled in classic and scientific learning, and habituated from its previous pursuits to close reasoning and analysis. The kindness of the late Mr. Peile insured him every facility for doing so. The Richmond Hospital, with its collateral institutions, afforded the most extensive opportunities for acquiring a complete professional education. Of these the new student most sedulously availed himself.

At this period a spirit of honourable rivalry characterized the teachers in the various Dublin hospitals. The profound knowledge of Graves and the rising genius of Stokes had inaugurated that system of clinical instruction which has since rendered their schools famous. Each sick-ward became a text-book for the exposition of disease. The impetus of competition among teachers was reciprocated by industry among students. Active pathological research constituted each anatomical theatre an arena wherein the problem of vital symptoms and material changes in their mutual reactions was ultimately investigated, if not solved. Morbid anatomy in its relation to vital pathology—changes after death in their connexion with indications during life—became objects of special study. Mr. Todd was distinguished as the most diligent of pupils. Then, no doubt, he became impressed with that spirit of medical eclecticism which subsequently characterized his practical writings, and constituted the chief peculiarity of his teaching. There he was taught that experience, reducing philosophy to practice, finds much in the principle of life inexplicable by the laws of matter: much that reason cannot solve, but which the physician must not therefore hesitate to encounter. As resident pupil in the hospital, Mr. Todd was led to the frequent investigation of disease in its post-mortem indications, and so laid the foundation of that disposition for pathological research which exercised so material an influence on his subsequent career. After the usual probationary studies

he was admitted as a Licentiate of the Royal College of Surgeons in Ireland on the 25th of May, 1831. His father's name and reputation were still cherished in Dublin. Bright prospects seemed to greet the young practitioner. With a view to the further perfecting of his education, he resolved to visit the continental schools. He arrived in London *en route*, when circumstances occasioned a change in his intentions. Shortly after his arrival in the metropolis a vacancy occurred in the Lectureship on Anatomy in the Aldersgate School of Medicine. For this appointment he was induced, by the late Mr. Travers, to become a candidate. His father's high reputation, his own known industry and opportunities secured his election. That internal confidence in his talents which is inseparable from greatness of mind enabled him to sustain its responsibilities. Thus, within a few months of his admission to the profession, we find him actively and perseveringly engaged in lecturing on and demonstrating anatomy, a branch of professional learning which, more than all others, demands unabating industry, close study, and practical acquaintance with its subjects.

Singularly assiduous and indefatigable in the duties of his position, the young lecturer soon established a reputation for accuracy and painstaking research which insured the attention and respect of his class. He resigned this appointment to join the school of the Westminster Hospital, which afforded a wider field for carrying out his favourite researches. At this period, twenty-five years ago, he projected his great undertaking the *Cyclopædia of Anatomy and Physiology*. The extraordinary merits of this work, in connexion with the then knowledge on the subjects treated, at once recommended it to the profession. In the year 1836, Mr. H. J. Rose, Principal of King's College, impressed with the great ability of the work, and the personal character of its author, induced him to seek the Professorship of Physiology and Morbid Anatomy in that College. To this distinguished position he was elected. About the same period he took an *ad eundem* degree in arts in the University of Oxford, and proceeded to the degree of M.D. in Pembroke College. Shortly afterwards he became a Licentiate of the Royal College of Physicians of London, and was appointed physician to the Western Dispensary and the Royal Infirmary for Children. In the following year he was admitted to the fellowship of the College of Physicians, and a few months subsequently elected a Fellow of the Royal Society. Dr. Todd was now in his twenty-ninth year. He had been resident in London but six years. We know of no similar instance of such a rapid success. Arriving among strangers without introduction, wanting those adventitious aids which enable men in professional life to work and wait

their time, each year brought him new rewards, the result of self-denying industry and untiring perseverance. At an age when many enter life, he had achieved high professional honours, and taken his stand on equal ground in the most distinguished scientific society of Europe.

Dr. Todd's success was self-acquired, the offspring of his individual merit. The medical youth of England will do well to reflect on the means by which it was accomplished. Habits guided by well-regulated prudence, which at the same time creates and preserves a fortune, maintained in their proper relation his expenditure and income. Each hour of relaxation devoted to literary pursuits, the remainder of his time occupied with professional business, left little opportunity for those temptations with which all large cities abound. That indefatigable spirit and purpose which are characteristics of high intellect; that unabated ardour which amid embarrassments of situation carries its possessor beyond the present, and causes immediate difficulties to be regarded as but further incentives to exertion; that probity of principle which secures friends, that simplicity of manners which disarms enemies, enabled him to conquer and overcome every obstacle, and in a brief time to be recognised as an authority on abstract questions of science, and esteemed as a worthy colleague by men of exalted station among a community into which but a few years before he had ventured to enter, to use his own honest but proud words, "without a sixpence to help him," and with scarcely a single friend.

How many young men commencing the practice of their profession lose sight of the great fact, that opportunity is as frequently the creation of ability as the occasion for its exposition! How many indulge the delusive belief that chance will supply what genius may command or industry accomplish! How many expect to reap rewards similar to those gained by others, yet care not to perform their labour! How many shrink from the patient, self-denying, self-sacrificing devotion to science, without which, success is meretricious, and fame must prove insecure! Let such thoughts be no longer entertained. He is not fit for professional success who does not, at his entrance on professional study, prepare his mind for an ordeal similar to that we have just illustrated; who, content to sacrifice his pleasures on the altar of science, does not find in duty performed a self-sustaining source of satisfaction, which imparts honour by anticipation, and points to merit as the only safe and certain road to independence and fame.

Henceforth we must consider Dr. Todd as occupying a new position. His connexion with King's College contributed in no inconsiderable degree to the foundation of the admirable hospital

now bearing that name, within whose walls so many pupils have benefited by his instructions. There can be no doubt that the character of his teaching has exercised a sensible influence on the preliminary education of the medical student. Dr. Todd regarded anatomy and physiology as sciences of the first importance. He esteemed a knowledge of the laws of life, and of its organism in health, to be the only sure basis on which pathology, as a science, can rest. He therefore eagerly adopted the several material aids for physical analysis which progressing science afforded, and found in the microscope and test-tube means for a closer approximation to the material changes perfected by agencies beyond the reach of either. A less enlarged mind would have succumbed to the apparent certainty of materialism, and so have reduced science to routine ; or, finding much that was inexplicable in the operation of disease, would have become sceptical, and lost confidence in the resources of his art. Dr. Todd committed neither of these errors. By a constant regard to the results of actual experience, as well as by the dictates of an enlarged reason : by a fixed determination always to be practical, at the same time giving scope to the most extensive general views : by a cautious and prudent abstinence from every extreme : by investigating, comparing, and pursuing the analogies of things, and, when practicable, tracing events to their remote origin, he rendered science subservient to the purposes of life, and reduced to materials for practice the suggestions of philosophy. As his observation of disease became more extensive, in the formation of his opinions he well and warily propounded his practical deductions, and although he viewed many subjects in different lights at the earlier and later periods of his career, he did so because the soundness of a more mature and practical judgment led to enlargement of speculative views, while a cautious circumspection of surrounding combinations resulted in a provident foresight into possible consequences. A careful regard for vital facts which observation of disease alone can give, as well as a more extended consideration of abstract principles which experience can alone impart, led him, in the diagnosis of affections and the application of remedies, to the nicer weighing of opposite arguments and the acuter perception of practical consequences.

There can be no doubt that a mind such as his, capable of detecting the wants, and a genius formed by nature to supply the deficiencies which observation discovered, would, had Providence so willed it, have accomplished lasting benefits for that science to which he was so entirely devoted. As it is, he has left great results behind him. In an age fruitful with discovery, he must be regarded, if not as the founder, certainly as the chief apostle of, and

most active labourer in a school which offers the fascination of atomic analysis. We rejoice to record that he lived to expound its true value.

Of the character of Dr. Todd's clinical teaching it would be impossible to speak too highly. He duly estimated the great importance and duties of a position which constitutes each hospital physician the responsible guide of those youths who are ultimately destined to have the most serious trusts committed to them. He lost no opportunity of impressing on all entering the medical profession the careful cultivation of habits of clinical observation and bed-side study. Looking upon medicine as an art, he regarded accuracy in diagnosis as the essential precursor of all safe treatment: viewing its practice as a science, with enlarged views of life, he carefully watched the operation of remedies. Possessing a quickness of apprehension which enabled him to see at a glance that which cost other minds the labour of an investigation, he yet, in the formation of the student's experience, proceeded to the consideration of circumstances that seemed to be of the most trifling account. So gradually developing to the young mind the necessity of careful research, he smoothed the difficulties in the beginner's progress, and encouraged him to a confidence in his untried capabilities of acquiring intimacy with disease. In this manner he secured the confidence and grateful affection of his class.

While thus perfecting his reputation as a sound practical physician, Dr. Todd by no means abated his labours on abstract science. In the year 1845, he published, in conjunction with Mr. Bowman, his *Physiological Anatomy*, which immediately became the standard work on the subject of which it treats. The *Cyclopædia*, by its recurrent appearance, reminded the profession that the practising physician still continued to labour in his closet. This work, which in its completion occupied the most active period of his professional life, was not brought to a close till a year before his death. This it was which first secured to him reputation as an author, and must ever be regarded as a monument of his industry. Yet inasmuch as a quarter of a century, over which its edition extends, is an age in science, we doubt, if he could have calculated that period, he would have undertaken so herculean a task. There is reason to believe that its publication, if it did not retard, certainly in no commensurate degree promoted his position as a practising physician. The idea got abroad that the cultivation of speculative science was inconsistent with practical observation; but the appearance of his clinical lectures soon removed this erroneous impression, as they at once satisfied the profession and public beyond the sphere of immediate judgment, of their author's capa-

city for the treatment of disease. In these lectures he manifested a power of analytical and inductive investigation in every department of medical science, which, while enlarging the range of knowledge, increased the active powers of art. A large and increasing practice followed their publication. In 1853, Dr. Todd was compelled, by the pressure of private engagements, to resign the Chair of Physiology, which he had so long and ably filled. Progressing practice necessitated his retirement from the duties of attendant physician to that hospital whose name he has rendered familiar throughout Europe. His farewell address was delivered a few months previously to his death.

Thus far have we traced the almost unexampled career of one who reflected, rather than received, a lustre from science. We forbear to enter on any critical analysis of the author when offering this tribute of our admiration and respect to the man. By his clinical teaching his name will live. He knew its value and illustrated its influence in his own career. The close identity of the views he propounds in his last volume on *Certain Acute Diseases*, with those which during his pupilage prevailed in Dublin, will be evidenced by referring to the lectures of Dr. Graves, delivered at that time. Thirty years ago the value of direct stimulation in general and local lesions was impressed by that great physician who pronounced as his own epitaph, "I fed fevers." It in no wise detracts from Dr. Todd's originality, that he supported, by philosophic deductions and with all the weight of his matured experience, the efforts of a worthy fellow-labourer in the great cause of Truth.

The particular circumstances which attended Dr. Todd's death by hæmatemesis are sadly interesting, if only from the close analogy they present to that of his honoured father. Both died from a similar disease. Both were called away suddenly in the meridian of life, while entering on the full enjoyment of professional prosperity. Both have left the impress of their teaching on the age in which they lived. It is sad for his friends to know that Dr. Todd had received more than one intimation that nature demanded repose. For about three years before his fatal attack, traces of albumen and sugar had been discovered in his secretions. He seems, in the earnest pursuit of professional engagements, to have neglected these warnings, and to have, to his latest moment, indulged in the most active mental exercise at the expense of his nervous system and the exhaustion of his physical strength. It followed that when the attack came, the sentinel was worn and weary at his post. The citadel was lost ere the presence of the enemy was recognised. Then with a faint and passive struggle was surrendered to the hands of Death, one to whom all the honours of a deservedly-won position had opened.

Dr. Todd will not soon be forgotten. He worthily upheld that great reputation his father bequeathed to him, rivalling his distinguished brother, who, in his native city, has likewise reached the summit of scientific eminence. He leaves to a young family, by whom he was beloved, a heritage more precious than wealth, in a high and unblemished reputation—to friends and a profession by whom he is mourned, the blameless integrity of a life devoted to their interests and sacrificed in their cause.

We have here briefly sketched a career on which, with sad remembrances, we would fain invite reflection. To the youth entering on the study of an arduous self-devoting profession, it speaks in terms of comfort and encouragement, and tells that labour shall not go without its reward. It bids the stranger who brings with him energy and ability, welcome to that competition wherein science shows no distinction of rank, and the high road to success is merit. In grave remonstrance it appeals to many who, in devotion to their profession, disregard those warnings which each day's experience affords. It bids such live wisely if they would live long. Fame and Fortune demand for their enjoyment health and vigour; he but half accomplishes his mission who attains one at the expense of the other. The grave and great responsibilities of professional life are too frequently permitted to absorb every consideration of self, until, at length, with his hand upon the prize, the victor falls, and cypress is interwoven with laurel in his crown.

ART. XIII.—MEDICAL GOSSIP.

THE College of Physicians of London, which had been described as a corpse galvanized into activity by the fear of annihilation under the Medical Act, has given a fresh proof of its real vitality. It had already sought a cure by transfusion of new blood into its veins; and now, invigorated by the great accession of members and the large addition to its coffers of the precious 'circulating medium' obtained by the creation of a batch of new fellows, and the admission of a still larger number of licentiates, the Council have resolved to strengthen their position yet further by bringing into relationship with their corporation the great body of general practitioners. Their determination to create a new order of licentiates, who shall not be restricted from supplying medicines to their own patients was a stroke of the most politic ingenuity. It had not the merit of originality, since it had long been urged upon them by the *Lancet* and other journals; but nothing could tend more strongly than this proceeding to

entrench the College in the strong affections and interests of the great mass of the profession of England. The Apothecaries Company in Blackfriars of course took fire instantly at a blow struck so vigorously against the flinty surface of their proper interest. They announced the determination to oppose, *vi et armis*, or yet worse, *lege et togâ*, the exercise of the proposed powers, which they declared to be vested solely in themselves by the Apothecaries Act of 1815, and by their revised charter. Of course, counsel's opinion was taken upon both sides; and perhaps also, as a matter of course, the question was rendered yet a little more complicated and dubious by the comparison of the adverse opinions so obtained from men equally eminent in the law. It may certainly be accepted as a by no means surprising result, that both parties found, in the opinions tendered, encouragement to proceed in the course of their already declared wishes, and try the question in a court of law. At first the College of Physicians resolved to adopt the timid course of asking for a decision of the courts before they proceeded to create their licentiates, but quite recently we learn that they have taken heart of grace, and are prepared to license practitioners in medicine, who may dispense the required remedies to their own patients, and of course, also, to accept the cost and responsibility of defending any action which may be set on foot to punish or prevent his exercise of those functions. This is probably at once the bolder and more prudent step.

Meantime, the College of Physicians of Edinburgh are actively watching over the interests of the thousand licentiates whom they admitted pell-mell in the year of grace, and have addressed a remonstrance to Mr. Secretary Herbert, who had expressed his intention of conceding a higher position in the estimation of the authorities of the Military Medical Department to graduates in medicine than to licentiates. Mr. Sidney Herbert is known to seek severe professional advice on such points, and his answer has indicated a clear appreciation of usances, which cannot be observed in a public department without the occasional infliction of injustice. After all, it must be remembered that the choice of an alma mater is not always voluntary; it is as often a question of money as of mind. A graduate of the oldest and highest universities is not necessarily a man of higher attainments than a licentiate of one of the corporations. And when once the standard of qualification is fixed, military medical officers may expect to be judged by the capacity which they show on entering the service and the zeal and ability with which they execute their labours, rather than by the source of their degree or the seat of their education.

The vexed question of medical titles remains still in a condi-

tion of chronic irritation. The relative proportions of right or courtesy involved in the bestowal of the cabalistic initials M.D. are the subject of constant controversy. In the case of the King's and Queen's College of Physicians of Ireland, Mr. Denny, the Irish Attorney-General, has given a formal opinion that the licentiates and fellows of that college are entitled to the degree and title of Doctors in Medicine, and to use the letters M.D. after their name. The charter of this college is exceptional in its wording; but the privilege being confirmed to the one college, there seems no great reason why it should not be extended to others more venerable and equally efficient.

The legal questions connected with the improper assumption of the title of Doctor have been tried more than once in the present term, and with uniform failure to procure conviction under the Medical Act. Not only has it been decided on the dictum of the Lord Chancellor that a practitioner being registered may call himself Doctor, without liability to any penalty, although he be neither a licentiate nor graduate of a medical college, but it has been affirmed by Mr. Selfe, the London magistrate, in a still more recent decision, that the fact of practising medicine, together with the simultaneous assumption of the title of Doctor by a person wholly unqualified, is not an offence under this Act, when this cannot be construed into a charge that the person, so acting, implied that he was registered. So awkward and double-edged a weapon was dearly purchased by the profession at the cost of forty thousand pounds.

The introductory lectures of the new session 1860-61, were delivered this year to a more numerous auditory than has for a long time graced the benches of the medical schools of the metropolis. The lecturer at St. Bartholomew's was Mr. Savory; at Guy's Hospital, Dr. Wilks; at King's College, Dr. Johnson; St. George's, Dr. Pitman; Charing Cross, Dr. Chowne; Middlesex, Dr. Stewart; University College, Mr. Erichsen; St. Mary's Hospital, Dr. Tyler Smith; Westminster Hospital, Mr. Power; Grosvenor-place School of Medicine, Mr. Lane. The Army Medical School at Chatham was opened by an address from Mr. Longmore, Professor of Military Surgery in that educational institute. The lecturers adopted for their themes subjects of the most various interest. Mr. Savory illustrated the text that genius means only transcendent power of taking trouble, first of all, by illustrations drawn from the life of the most illustrious philosophers, warriors, and physicians. Dr. Pitman introduced a variation of the same *thema*. Dr. Wilks attacked warmly the doctrine of specialities, and thought the English profession were more than ever open to the ridicule of Goldsmith, who said that in his time, in England they had "one doctor for the eyes; another for the toes; their

sciatic doctors, and inoculating doctors; one doctor who is modestly content with securing them from bug-bites, and five hundred who prescribe for the bite of mad dogs." Mr. Grainger took his leave of a school in which he has long and ably taught, in an oration characterized by lofty and nobly inspired reflections upon the relations of life and matter. The address of Dr. Johnson bestowed upon the late Dr. Todd a well-merited apotheosis.

Mr. Hilton has, in his quality of Professor of Anatomy and Surgery to the College of Surgeons of England, delivered a series of lectures on "Pain and the Therapeutic Influence of Mechanical and Physiological Rest in Accidents and Surgical Diseases." Rest he regarded as the necessary antecedent of repair and growth. Borrowing his first illustration from cerebral disorders, Mr. Hilton recalled the frequency with which rest is a sufficing cure for mental disorders arising from overwork. He regarded the elastic capsules of the visceral organs, as a means of relieving them from the vascular turgescence which accompanies their temporary activity, and thus restoring them to physiological rest. The cerebro-spinal fluid was regarded similarly as a mechanical support to the internal parts of the brain, when they ceased have to be in the condition of physiological turgescence, and, supported by the cerebral circulation, as tending to bring back these internal parts of the brain to a state of comparative emptiness or quiescence after their state of activity.

Passing to practical and pathological illustrations of the value of rest, Mr. Hilton related numerous interesting instances of diseases of the spinal column, painful ulcers, and other surgical affections, in which the diagnosis or the cure have been due to the study of pain as a symptom, and rest as a therapeutic means. This course of lectures has been marked by great ingenuity, and philosophic and original research.

Of other lectures for the quarter, there have been the Lettsomian lectures on "Medicine," by Charles J. Hare, M.D., entitled "Practical Observations on some of the Points of Difficulty in the Investigation and Diagnosis of Tumours and Intumescence of the Abdomen."

The lectures at the London College of Physicians are to be delivered as follows, during the ensuing year. The Lumleian Lectures by Dr. Barker, Croonian Lectures by Dr. Guy, and the Gulstonian Lectures by Dr. Brown-Séquard. Short courses of lectures will also be given by Dr. Garrod and Dr. Lionel Beale.

The neglected state of the last resting-place of the illustrious Harvey at Hemel-Hempstead, has been the subject of much discussion since Dr. Tyler Smith drew professional attention to its indecorous disorder. The necessary repairs have, we believe, been executed, but a correspondence is in course between the

College of Physicians and the descendants of the great English physiologist, having for its object the removal of the remainn Harvey to Westminster Abbey.

The retirement of Ricord from the post which he has occupied at the Venereal Hospital of Paris for the last twenty-five years, has been attended with wide-spread demonstrations of respect and esteem for the eminent syphilographer. His retirement has raised anew on this side of the channel the question of the superannation of physicians and surgeons of hospitals as regulated in France, where physicians are expected to retire at sixty-five, and surgeons at sixty. The oft-expressed opinion is repeated that at such an age surgeons and physicians have done all that they can do efficiently for their hospital, and the hospital has done all that it can do for them. It is time that they should make way for other men, long and faithful servants of the poor, who are now too often withheld from posts to which they have a natural claim. The assistant-surgeons and physicians of the London Hospitals continue to complain loudly and justly of their anomalous position, which demands of them during a long series of years the most arduous labours, and considerable expenditure of time, while it imposes an often almost life-long inferiority of title and grade, together with a total denial of remuneration. This is a relic of the old days of oligarchy and nepotism, when the whole power was in the hands of a few in the hospitals, and there were many who were content to serve in bondage for "seven years and more," in the hope of rewards in the future. At King's College and St. Mary's Hospitals, both of which include in their managements some *esprits novateurs*, progress has been made towards remedying the evil.

The newly published list of the College of Surgeons of England shows that 249 members have been admitted fellows of examination, 16 more than last year. There are now 1267 fellows and 14,000 members, 769 licentiates in midwifery, and 100 licentiates in dental surgery.

The annual balance-sheet of the College has also just been published. The receipts amount to 22,307*l.*, of which 4756*l.* is derived from the sale of stock: the expenditure to 21,906*l.*, of which 7761*l.* is devoted to purchase of additional premises; while of the rest no less than 9215*l.* is devoted to "College department, including Council, Court of Examiners, Dental Board, &c.," and only 634*l.* to the "Library, including purchase and binding of books, salaries, &c." Truly these gentlemen are very careful that they be themselves well paid and well fed, and devote more to their own material support than to the intellectual alimentation of all their members.

The quarter has not been very fruitful in miscellaneous medical news.

The Social Science Association, which held its meeting at Glasgow early in the quarter, was fairly attended by medical men, especially in its sanitary section. Besides the local members of the profession, Sir Charles Hastings and Dr. Lankester read papers on Sanitary Science. The subject of provision for idiots and imbeciles was carefully discussed in a paper presented by Dr. Brodie, who estimates this class at 12,000 persons in England and Wales, for whom provision exists for only 600. The Glasgow faculty took occasion to protest against the present system of compelling medical practitioners in Scotland to furnish gratuitous certificates of death.

In journalism the *Akbare Jubabut* is the latest announced addition to our medical literature. This quaint periodical sheet is a monthly publication; intended to form a medium of communication between the native doctors in Government employ in India and native hakeems, with the view of spreading surgical and medical knowledge among the natives for the alleviation of their diseases. We heartily wish it success. The last report of Dr. Hobson's Missionary Hospital in China speaks of great success among a less promising population, and probably it might be well to consider the propriety of founding similar establishments in India. A new *Natural History Review* is announced in London, in the editing of which a part will be taken by Dr. Carpenter, Mr. Busk, Professor Huxley, and others.

We are glad to hear that the Army Medical Department is preparing, under the energetic rule of Dr. Gilson, and with the able help of Dr. Mapleton, Dr. Balfour, and Mr. Fitzgerald, to bring out a first printed annual report of the health, sickness, and death rate of the British army at home and abroad. Such returns will be highly interesting, as bringing the army henceforth under the critical observation of civil sanitarians, and furnishing reliable data for discussion.

The general state of health of the troops in China has been admirable, testifying at once to the excellence of the arrangements made by Sir John Little and Dr. Gilson for the services under their respective control, and to the importance of giving due weight to the counsels of the medical department in all that can affect the health of the army. This lesson was taught in the Crimea at a terrible cost. It would seem, at least, not to have been learnt in vain.

The long agitation of the militia surgeons has at length elicited an offer from the Secretary of State for War to give them commissions to the line, provided they pass the necessary examination. We fear that the proviso will render the promise nugatory

in many cases where the boon is most needed. To call upon men long employed in active service to pass examinations instituted for young men fresh from college, is to apply a very unfitting test. This was long ago proved in the civil service, and is always kept in mind by the most ardent advocates of the competitive system, among whom we rank ourselves.

Among the civil appointments of the quarter we have to record those of—

Dr. Wollaston, as Physician to the South Staffordshire Hospital.

Dr. Letheby, as Analyst to the City of London.

Dr. Bence Jones, F.R.S., Secretary to the Royal Institution, in room of the Rev. John Barlow, F.R.S., resigned.

Mr. Daniel Oliver, F.L.S., Librarian at the Kew Gardens, to the Professorship of Botany at University College, vacant by the retirement of Dr. Lindley.

E. B. Gray, Esq., M.B.C.K., as Physician to the Radcliffe Infirmary, in room of Dr. Rolleston.

Dr. P. Chaplin, Physician to the English Hospital for Jews, at Jerusalem.

J. H. B. M'Leod, M.D., Professor of Surgery in Anderson's University, Glasgow.

Mr. Jonathan Hutchinson, joint Lecturer on Surgery at the London Hospital Medical College, in place of Mr. Critchett, resigned.

FOREIGN MEDICO-PSYCHOLOGICAL LITERATURE.

OUR Retrospect of current Foreign Medico-Psychological Literature will embrace the following subjects:—

1. The Meeting of German Alienist Physicians at Eisenach in 1860.
2. Osteomalacia as a Cause of Insanity.
3. The Occurrence of Entozoa in the Insane, particularly the *Oxyuris Vermicularis*.
4. Hæmatic Swellings of the Ears in the Insane.
5. Congestive Mania.
6. Hysteria and Hysteromania.
7. Hypochondriacal Insanity as a Precursor of General Paralysis.

- 1.—*The Meeting of German Alienist Physicians at Eisenach in 1860.*

UPON the invitation of the Editors of the *Zeitschrift für Psychiatrie*, a number of German physicians, engaged in the management of the insane, met at Eisenach, Sept. 13th and 14th, 1860. Drs. Damerow and Martini were chosen as Presidents for the two days; and one of the subjects which excited a lively discussion was that of "lunatic

colonies," introduced by Dr. Flemming. The meeting, while acknowledging how very desirable it is that a portion of the incurable insane should be provided for outside asylums in a suitable manner and at a moderate expense, was most decidedly of opinion that the imitation of the lunatic colony at Gheel, sought for by certain enthusiasts and psychiatrical dilettanti, was not likely to further the interests of either science or humanity. The opinion was very generally expressed that any experiments of this kind should first of all be tried in the vicinity of existing asylums. The further consideration of the subject was adjourned until the next meeting. With respect to the economical care of the insane, the meeting was of opinion that erections are now sometimes made of a needless elegance, and that money is unnecessarily expended upon immaterial portions of these. While admitting the desirableness of entertaining Dr. Schlager's proposition of the preparation of a new legislative code concerning the insane, the meeting deemed it first advisable to examine and arrange all the materials to be found in the various laws and decrees of the different German States. Dr. Jessen besought the Society to use all its influence in order to get psychiatrical chairs and clinics established in all the German Universities. He pointed out the neglect with which psychiatry was treated in these Universities as compared with the other branches of medical knowledge, and the ill consequences which result from the ignorance that prevails amongst practitioners upon the subject, while no ill effect is produced upon the patients in asylums when made the subjects of clinical instruction. Notwithstanding the obstacles which would present themselves to the carrying out this resolution, the meeting felt called upon to adopt it; and, bearing in mind the little zeal which had hitherto been manifested in the study of psychiatry, it also was of opinion that this should be rendered an obligatory part of the curriculum. Dr. Laehr brought under the notice of the meeting the question of the internal arrangements of asylums, as regards water-closets, heating by hot water, and cooking by steam. Those present, who had witnessed the superior construction for these purposes in England, were of opinion that, both as regards material and workmanship, much has to be done in Germany before similar results can be attained. Dr. Ludwig exhibited a specimen of hypertrophic degeneration of one of the olivary bodies, which had occurred in an individual who had exhibited no difficulty in either speech or articulation; the case, therefore, not confirming Schroeder van der Kolk's view of the agency of the olivary bodies in the production of the voice. The proceedings were closed by the announcement that the Editors of the *Zeitschrift für Psychiatrie* offered a prize of twenty gold Fredericks (about 16*l.*) for the best essay upon a subject relating to Psychiatry. Competitors may forwards their essays, observing the usual conditions with respect to mottoes, &c., to the Editors of that journal prior to the 1st of August, 1861.

2.—*On Osteomalacia as a Cause of Insanity.* By Dr. FINKELNBERG.

DR. FINKELNBERG observes that the etiological relation of rachitic softening of the skeleton in childhood to the production of insanity in after years is generally known, and can be illustrated in every large asylum. But whether the nearly allied condition of osteomalacia in the adult, especially as seen in puerperal women, presents an analogous relationship to disturbances of the cerebral functions, has not been noticed by writers on insanity, while it is denied by distinguished writers on female pathology, such as Scanzoni and Kilian. The author in the present paper, communicates two cases in which the first commencement of the psychical disturbance coincided with the acute stage of osteomalacia, no other cause of the condition, which terminated in that of confirmed and incurable insanity, being detectible. Of course, both patients being still alive, the precise nature of any changes which may have taken place within the cranium cannot be stated. From the examination which could be made, however, and guided by what has been recorded by Lucæ and Isenflamm concerning examinations of the cranium in their cases of patients dying with marked osteomalacia (in these instances, however, without insanity being endured) the author supposes that the base of the skull may have participated in the softening process leading to an encroachment upon the cavity of the cranium by the basilar process of the occipital bone, while the walls of the cranium itself have probably undergone considerable thickening and separation. At all events he is desirous of calling the attention of the profession to the probable connexion that may sometimes exist between osteomalacia and insanity.—*Allg. Zeitschrift für Psychiatrie*, Band xvii. s. 199—209.

3. *On the occurrence of Entozoa in the Insane, particularly with respect to the Oxyuris Vermicularis.* By Dr. VIX.

THIS monograph, extending over some 160 pages and terminating with 84 conclusions, is occupied far more with the zoological than with the medical relations of the subject. The author's attention was first called to the matter, after having long observed the frequency with which worms are found in the intestines of insane persons dying of marasmus, by a very marked case which occurred in the asylum to which he is attached. The large intestine was found to be lined throughout its entire extent with *oxyures*, which almost entirely constituted the entire mass of the faecal balls which the intestine contained, the cæcum also containing numbers of *trichocephali*. In the absence of disease in any other organ, the author attributes the symptoms observed during life and the issue of the case to the presence of this immense collection of worms. He adverts, too, to the well-known facts of verminous irritation giving rise to various affections of the nervous system, frequently operating through sympathetic action set up in the genitals. His essay, as we have said, does not contain much

of interest to the medical reader. He lays much stress upon the ease and frequency with which the ova may be detected by means of the microscopic examination of the intestinal mucus, and he considers that injections of vinegar, or solution of potass, or of medicinal soap, constitute the best means of destroying the worms, and preventing the development of their ova. — *Allg. Zeitschrift für Psychiatrie*, Band xvii. s. 1, 14, und 227.

4. *On the Hæmatic Swelling of the Ears of the Insane.* By Dr. GUDDEN.

DR. GUDDEN first points out that ears closely resembling those of the insane affected with blood swelling are not unfrequently met with amongst ancient sculptures depicting pugilistic athletæ. This condition of the ear was produced by the blow given by the strong arm of the boxer, his hand being enveloped by a leather thong. He next criticises the explanations of their occurrence in the insane usually given, as exemplified in Fischer's treatise, one of the latest on the subject. Fischer believes that such swellings are never met with, unless preceded by chronic inflammation of the cartilage and its covering, the anatomical effects of which consist chiefly in the production of cavities of various sizes in the substance of the cartilage, or between it and the perichondrium. These, the author maintains, are due to the employment of violence, and according to the degree of this, sanguineous effusion also may or may not take place—any inflammation which may result being only secondary to such violence. He also disputes the statement made by Fischer and other authors that these effusions take place only under the influence of scorbutic or other dyscrases or cachexiæ. The only influence of such conditions would be to facilitate the effusion of the blood after the violence.

Among the proofs which he adduces of violence being the cause are the fact of marks of finger-nails being frequently present, the left ear, (more exposed to violence from the right hand) being usually the one affected, and the greater frequency of the occurrence in men than in women; the latter being less exposed to violence and their ears being better protected by their hair and by their dress. Paralytic patients (paralytic males being more frequent than females) are more liable to such swellings than others, not owing to the presence of a dyscrasis, but from their greater liability to ill-usage and their insensibility to its effects. As to the assertion made by Flemming that this injury is self-inflicted, the author replies that during ten years' residence in large asylums he has never met with an instance in which the injury could be traced either to the patient himself or to other patients, while he has been often able to bring it home to the attendants. The frequent accompaniment of the marks of finger-nails show that the ear has been seized and violently pulled by the fingers. Since he has laid down the rule in the asylum to which he is attached of holding the attendants liable for the occurrence of the swelling, the number of cases has remarkably diminished.—*Allg. Zeitsch. für Psychiatrie*, Band xvii. ss. 121-138.

- 5.—*On a Form of Insanity for which the name of Congestive Mania has been proposed.* By J. H. WORTHINGTON, M.D., Superintendent of Friends' Asylum for the Insane, Philadelphia, Pa.

AFTER alluding to the probability of an increase of insanity in a proportion greater than that of population, and to the increase of the severer forms of the disorder, Dr. Worthington proceeds:—

"It is to be hoped so extensive a prevalence of the worst grades of insanity, culminating in general paralysis, as exists at this time in the hospitals of Europe, may never be witnessed in this country. There is, however, a form of cerebral disorder presenting some of the prominent mental characteristics of general paralysis, and arising from the same causes, which, it appears to me, is on the increase in our large cities, and which I have thought might profitably claim the attention of the Association.

"The mental disorder in this class of cases, of which I propose to give a brief description, I have always been in the habit of considering as symptomatic of some grave organic lesion of the brain. From the commencement of the attack, the intellectual disorder is strikingly different from that which is manifested in ordinary insanity. It may appear under any of the usual forms of insanity. The patient may be excited, as in mania and monomania; or depressed, as in melancholia; but, in addition to emotional disorder and the delusions which are prominent characters of these forms of insanity, there are evidences of decided intellectual impairment. The memory is, I believe, nearly always more or less affected, sometimes to the extent of completely blotting out every event of the past life. The patient is generally unable to note the lapse of time, or to form a correct idea of his locality, or of the circumstances by which he is surrounded. Persons affected with this form of insanity are frequently in error respecting their place of abode;—if in a public institution fancying that they are in a hotel, and that they have business requiring attention in the next street. The merchant has some important engagement, the physician his patients whom he is anxious to visit, and the mechanic imagines he has been engaged in his daily occupation, and wishes to return to his family who are expecting him. In these cases the memory, if not entirely null, is so far impaired that the patient is unable to connect his present with his former situation by an intervening chain of events, by which means his erroneous conceptions might be corrected.

"The degree of mental impairment which always exists in these cases, indicating a serious lesion of the cerebral structure, and the consequent gravity of the prognosis, seems to require that they should be distinguished from cases of simple insanity, in which the mental manifestations and termination are so different. The mental condition peculiar to them is scarcely ever observed to originate during the progress of ordinary mania or melancholia. On the other hand, their characteristic physiognomy is strongly impressed upon them from the beginning; so that you will be able to say, with great certainty, that a case is incurable, when otherwise the recent origin of the disorder would warrant the strongest expectations of recovery.

"In some of these cases the insanity, consisting mainly of the most extravagant delusions respecting the wealth or social position of the patient, very closely resembles that form of mental aberration which was until recently considered as almost exclusively belonging to general paralysis. A distinguished French alienist* has not hesitated to class these with the last named disease, even before the appearance of the slightest symptom of paralysis. Another celebrated authority,† while recognising the serious character of these cases, and believing that they frequently end in paralytic insanity, is still unwilling that they should be distinguished from cases of simple insanity, until evidences of impaired muscular action are unequivocally present. A third equally eminent name‡ has declared in favour of separating these cases from simple insanity, on the one hand, and from general paralysis on the other, and making of them a distinct class, under the name of "congestive mania." This term seems well adapted to express the character of the cases which I propose to describe, and I make use of it rather as a matter of convenience than for the purpose of dignifying them with the rank of a distinct disease.

"The prominent mental characteristic of congestive mania is diminished power, which is manifested chiefly by confusion of ideas, incoherence of language, and impaired memory. The term confusion of ideas seems to me very expressive of that condition of mental chaos in which—

Congestaque eodem
Non bene junctarum discordia semina rerum ;

in which the discordant elements of thought are so confused and mingled together, that the patient is unable to arrange them in an orderly and connected manner. The incoherence differs from that observed in ordinary mania, which results from an exuberance of ideas struggling, as it were, for expression, and forcing themselves into utterance without any regard to orderly arrangement; while in this form of mania, the want of coherence is owing rather to the absence of that mental vigour which is necessary for following out a connected train of thought.

"Failure of memory is, however, the most striking indication of the intellectual impairment. It is not unusual, when patients affected with this form of insanity are taken to a public institution, for them to retain but very indistinct recollections of their journey, and these even may be very soon entirely obliterated. When left by their friends they scarcely inquire after them, or realize the novelty of their position. They imagine themselves to be engaged about their customary business, because they are unable to draw correct conclusions respecting their position from the circumstances in which they are placed, and because their memory fails to present to their minds the succession of occurrences which is necessary to connect, and at the

* Dr. J. Farlet, *Annales Médico-Psychologiques*, tome v. p. 127.

† Dr. Parchappe, *Annales Médico-Psychologiques*, tome v. p. 479.

‡ Dr. Baillarger, *Annales Médico-Psychologiques*, tome iv. p. 579.

same time to separate, their past and present. Patients affected with simple insanity, when placed for medical care in an institution, generally recognise at once the character of the establishment, and frequently manifest considerable ingenuity in framing reasons for their confinement, which may appear to themselves or others consistent with the theory of their own mental integrity. The profound mental impairment of those affected with congestive mania is shown, on the other hand, by the fact, that they are seldom aware of the nature of the institution in which they may be temporarily residing, and if they are partially conscious at intervals of their confinement, they can discover nothing in the fact that is inconsistent with the ideas they entertain of their perfect mental and physical health, or of their exalted station and influence, and never seem to feel the necessity of doing away with the imputation of insanity by explaining why they, who are perfectly sane, should be placed in confinement with lunatics. Those affected with simple madness often display great energy and perseverance in the pursuit of an object, and are very ingenious in adapting their means to the end in view. In congestive mania, on the other hand, patients seldom manifest much perseverance in the accomplishment of their designs, and when they do so the means they employ are often ludicrously disproportionate to the results they anticipate. Sometimes, as in ordinary mania, patients manifest considerable muscular energy and activity, and a strong desire to be in motion, but their activity is generally without an object, and appears to be mechanical rather than voluntary.

“The form which the mental disorder assumes in congestive mania varies in different cases, and is dependent upon the predominance of emotional excitement on the one hand, or of depression on the other. The patient sometimes presents the wild excitement of the highest grades of ordinary mania. He may be violent, destructive, and noisy, and as he is, in consequence of the impairment of his reasoning powers, incapable of being influenced by any appeal to his better judgment, he is frequently very difficult to control. In many cases the emotional condition partakes of that gay and expansive character which has been so frequently described as a symptom of general paralysis. The patient is pleased with himself and every one with whom he comes in contact. He entertains the most extravagant delusions respecting his fortune, his social position, or his personal influence. He believes himself the possessor of immense wealth, and has offices, gifts, or preferments to bestow upon all. He forms the most magnificent schemes for his own and the aggrandizement of his friends, and is most profuse in his promises to those whom he is desirous of enlisting in his service. He thinks himself in perfect physical health, and possessed of great muscular strength, and distinguished mental abilities. These patients are frequently subject to hallucinations, especially of hearing, and voices at enormous distances, which no other ear can hear, are plainly audible to them; and they thus hold conversations with the Almighty, or with distant or departed friends. Their manner is frank, open, and free, and their whole figure and expression manifest the highest degree of satisfaction, contentment, and happiness.

"The prominent delusions, on the other hand, may be of a painful character. The patient will be impressed with the conviction that his sins have incurred the Divine displeasure, and that he can never obtain forgiveness. They sometimes accuse themselves of great crimes, which they say they have secretly committed, and believe that their malady, of which they are to some extent conscious, is sent as a judgment from Heaven to punish them. They believe that their misdeeds have brought extreme distress upon their families, and all that are most dear to them; or that they have rendered themselves amenable to justice, and that the institution where they may have been placed for medical treatment is a prison where they have been sent for punishment, and where they are doomed to undergo the most dreadful tortures. They imagine that they are to be burned or flayed alive; that they are to be scalded to death; that they are to be shot, or hanged, or poisoned. They are frequently harassed by hallucinations, and fancy that they hear voices threatening them with punishment, or devising means for their torture. In some instances they voluntarily seek death, as the only mode of escape from their sufferings; in others, under the impression that it is sinful to eat, or because God has forbidden them to do so, they refuse nourishment for long periods, and in consequence become extremely weak and emaciated. They frequently imagine themselves to be the victims of some secret persecution, and that their enemies are seeking means to compass their destruction. They believe themselves acted on by some mysterious influence which they call magnetism or electricity, and by which they suppose their enemies are able to injure them without fear of discovery.

"In another class of cases the emotional disturbance may be very slight, even at the commencement of the attack, and there may be very little outward manifestation, either in language or conduct, of the serious nature of the disease, which may have fastened itself irremediably upon the patient. He may quietly entertain some delusion respecting his fortune or social position, or believe himself under the special guidance and protection of the Almighty, and may be subject to various hallucinations, while his language and deportment, to common observation, may be those of a sane person. But in these cases there is always marked impairment of the mental faculties, under the form of enfeebled memory, or inability to comprehend any subject upon which you may wish to fix his attention. When conversing with a case of this description, you will sometimes be made painfully sensible of the futility of every effort to impress him with a new idea, while he may perhaps talk sensibly and rationally on subjects with which he is already familiar.

"The above are the prominent mental characteristics of the cases of insanity which I propose to describe under the name of congestive mania. The most of the symptoms which have been named are, however, met with in cases of simple insanity, under one or another of its various forms, and I would now call the attention to a different class of symptoms, which may be considered as peculiar to the congestive form of the disease, and therefore as distinguishing it from simple insanity. These are the physical phenomena indicating

the congestive character of the disease, which has attacked the nervous centres.

"Among the general symptoms peculiar to congestive mania, are those which indicate cerebral oppression; and these may vary from slight giddiness or confusion of ideas, to the most complete deprivation of sense and motion. Instead of the heightened sensibility to external impressions, which is a striking characteristic of simple mania, there is always in the congestive form diminished acuteness of perception. Though the organs of the special senses may be perfect, the brain seems incapable of receiving clear and distinct impressions of outward objects, so that the patient rarely forms correct ideas of the circumstances in the midst of which he is placed. As in general paralysis, there is diminished sensibility to pain, and in some instances, where the congestion extends to the portions of the brain supplying nerves to the sensitive organs, there is impairment of vision or of the senses of smell and taste, and patients sometimes experience a sensation of numbness in the extremities. Another set of symptoms which indicate cerebral congestion, are those which, without amounting to paralysis, are yet evidences of diminished muscular power; such as tremulousness of the hands, lips, or tongue, unequal dilatation of the pupils, and indistinct articulation, when it is slight, and when it is observed only at long intervals. In some cases the whole muscular system seems to be remarkably deficient in energy. The patient walks bending forward, or with a shuffling motion of the feet, and all his movements are stiff and constrained; or he reels from side to side in walking, like an intoxicated person. In other cases there is evident though slight paralysis, which is frequently temporary, confined to a single muscle or set of muscles, and manifested by the drooping of an eyelid or slight relaxation of the muscles of one side of the face. There are cases, again, where the muscular system is affected with spasm—there may be grinding of the teeth, or muscular jerkings of the extremities, or the whole system may be affected with convulsions which closely resemble those of epilepsy.

"In some cases the disease commences with an attack of cerebral congestion, during which the patient remains unconscious for perhaps only a short period. On recovering consciousness he will appear confused and bewildered, and the mental disorder will gradually increase until it amounts to decided insanity. At the same time the pupils may be unequally dilated, or muscular tremors may be observed in the tongue or lips, or in the upper extremities. In other cases there may be several attacks of unconsciousness, without any appearance of mental aberration for a considerable time. In others, again, the congestion may be so slight as not to render the patient unconscious, and he will complain only of giddiness and confusion of ideas, until at length mental disorder will become more manifest.

"In another class of cases the mental aberration exists for a considerable time before the physical symptoms, indicating the nature of the disease, make their appearance. Here, however, the insanity generally manifests that peculiar tendency to dementia, which has been mentioned above as denoting the congestive form of the disease.

After the attack has existed for several weeks or months, the patient will be found exhibiting symptoms of decided cerebral congestion. Having previously been in a condition of high mental excitement, he will all at once appear silent, subdued, and bewildered, he will be unable to comprehend anything that is said to him, will perhaps be unable to speak, and in walking his body will incline to one side. These symptoms may continue for a few hours, and under appropriate treatment the patient may gradually be restored to his former condition, or they may speedily be followed by an attack of convulsions resembling epilepsy, succeeded by coma of many hours' duration.

"Some of these cases are presented under the sub-acute form, and resemble somewhat that affection which has been described by Dr. Bell of Massachusetts as a new form of disease, by different authors under the name of acute delirium, and by Dr. Calmeil as insidious peri-encephalitis. Patients manifesting the symptoms which have been described under the above names, sometimes linger a considerable time, and before death, and even during the whole progress of their disease, present tremors and other signs of muscular impairment, which have been described above as peculiar to this form of disease, and as indicative of cerebral congestion. In these cases the patient sleeps but little, and the digestive functions become seriously implicated. The natural desire for food and drinks is entirely lost, the tongue is covered with a thick fur, and at length becomes dry and brown, the breath has a peculiar acid or an offensive odour, emaciation rapidly progresses, eschars form on the parts of the body most subject to pressure, and the patient dies, apparently exhausted in consequence of long continued nervous irritation, and impairment of the nutritive functions, rather than from the direct action of the disease upon the brain itself.

"In congestive mania there is a strong tendency of the system to that form of general, functional impairment, which has been described by Dr. Parchappe under the name of *cerebral marasmus*. Under the influence of the various painful delusions from which these patients so frequently suffer, but more especially owing to the depressing effect of the cerebral disorder upon all the functions, the vital powers become gradually exhausted. Sometimes, even when food is taken freely and regularly, the patient rapidly emaciates, and his muscular strength diminishes, until he is no longer able to keep on his feet. In these cases of marasmus there is frequently a tendency to the formation of abscesses in the subcutaneous cellular tissue, which may thus become infiltrated with pus in large quantities. The mucous membranes appear to be particularly disposed to take on inflammation, and troublesome diarrhoea or bronchitis frequently sets in. The circulation gradually becomes weaker, and eschars form over the sacrum or trochanter. All these complications tend to exhaust the remaining strength of the patient, and to hasten the fatal termination of the disease.

"In some cases where the patient has remained stationary for a considerable time, enjoying a good share of bodily health, symptoms of acute cerebral disease will be all at once presented. The pulse will become

frequent, there will be almost entire absence of sleep, the delusions will be of the most painful and distressing character, the patient will be in constant agitation, and will require to be kept in bed by main force, and will obstinately refuse food and medicine and every attention that his case requires. With these symptoms he will go on from bad to worse for several days, when he will suddenly be found in a sinking condition, and die in a few hours in a state of profound collapse. In other cases a comatose condition, sometimes preceded by convulsions, at others becoming more gradually established, makes its appearance, and is followed by death in a few hours.

"Some cases occurring in young persons of good constitutions, who have presented the symptoms indicating a slight degree of cerebral congestion, are gradually restored to mental health and vigour. In other cases, though the delusions and all emotional disturbances have vanished, and there is no decided symptom of mental disorder remaining, there is something about the patient which leaves a doubt on the mind of the physician of his entire recovery. In these cases there is a slowness and manifest effort in the intellectual operations, which clearly show the injury which the organ of thought has sustained, and its consequent unfitness for performing its functions with the quickness and ease natural to it in health. Such patients are liable to a renewal of the original cerebral disorder, which may be of so aggravated a character as speedily to destroy life, or the brain may only be injured to an extent which leaves the patient permanently demented. In some cases the disease, after a course of many months, takes on the characters of general paralysis. The patient gradually loses the power of articulation, his gait becomes unsteady, his limbs at length refuse to support his weight, and all the symptoms of that form of cerebral disease are fully established.

"The character of the mental aberration—the chaotic confusion of ideas, the incoherence, the impairment or loss of memory, the inability of the patient to form correct conclusions respecting his locality from surrounding objects, all indicating a profound lesion of the intelligence—will in any case of insanity of recent origin be sufficient to arouse the fears of the practical alienist, who will at once conclude that in a case presenting this form of aberration he has to manage a very different disease from ordinary insanity. Dr. Parchappe* ranks all cases presenting this mental condition with simple insanity, and considers them as cases of purely *dynamic* or functional disorder, while he attributes the *plastic* or organic character to those cases only which present the complication of general paralysis. Cases are, however, frequently met with, sometimes under the form of ambitious mania, sometimes under that of melancholia or hypochondriasis, presenting the condition of mental impairment which has been described above, but without the slightest symptom of paralysis, which, on account of their incurable character, or their speedily fatal termination, it is of the utmost importance, in a practical point of view, to distinguish from simple insanity. Dr. Guislain (*sur les Phrenopathies*, vol. i. p. 368.)

* *Annales Médico-Psychologiques*, vol. iv. p. 475.

has spoken of the difficulty of distinguishing insanity accompanied with cerebral congestion, during its early stages, from the simple uncomplicated form of the disease. 'The conditions,' says he, 'which excite the fears of the physician, are the persistence and increase of the mental disorder, the complete absence of moments of calmness and rationality, the appearance of acute symptoms in a case which has become chronic, confusion and incoherence of ideas, accompanied with feebleness of conception and memory, spreading itself like a veil over all the perceptions. * * You may suspect its existence if, from the origin of the malady, you observe violent passions in connexion with great disturbance in the domain of thought, and if you observe ideas which recall a state of marked intoxication, if from the beginning the conversation is incoherent, if the words have neither order nor connexion, and if there is exaggeration, existing at the same time with enfeeblement of thought, if the answers of the patient bear the impress of extravagance, if he boasts with a puerile air of his bravery, his wealth, or his intellect.' This author remarks that as long as the ideas are clear, however extravagant they may be, there is no reason to fear cerebral congestion. It is not to be suspected in simple insanity, or in cases where an exaltation of the passions or emotions, or even an unaccustomed impulse of the will, characterizes the disease, nor in any other form of insanity which does not present indications of decided intellectual impairment. He speaks of emaciation, muscular rigidity, involuntary evacuations, convulsions, and paralysis, as diagnostic signs of this complication. When the congestion produces effusion between the membranes, 'the symptoms,' says he, 'are sometimes truly alarming. They consist of a sudden change in the mental and physical condition of the patient. Sometimes a state of coma is followed by a notable loss in the sum of the intellectual acts, in other cases there is incomplete hemiplegia, muscular contractions, jerking, or general convulsions, followed by complete suspension of all the sensorial acts.'

"The above symptoms when fully developed will leave no room for doubt as to the nature of the disease, as distinguished from simple insanity. During its forming stage, before the certain indications of congestion have made their appearance, the existence of such evidences of intellectual impairment as have been described will put the physician on his guard against deciding too hastily as to the harmless nature of the malady. From general paralysis, it may be known by the absence of all symptoms of paralysis, except such as are only occasional and temporary, very partial in their extent, and so slight as scarcely to attract notice. In that disease, the paralysis, though slight in the beginning, is manifested in all parts of the muscular system, is constantly progressive, and at length, both in extent and severity, comes to be the most striking feature of the disease.

"That there is a very strong relationship between congestive mania and general paralysis, is fully attested by the resemblance of the mental disorder, and the identity of causes which produce the two forms; and if it were possible for paralytic insanity to exist without paralysis, we might feel tempted to refer both classes of cases to that affection as to

an admitted and well-established form of cerebral disease. There is indeed strong ground for believing them to be identical in their nature, and that consequently the paralysis is not an essential feature, but only a complication or one of the modes of termination of the disease. Dr. Parchappe, it is true, classes all cases such as I have been describing with simple insanity, under the head of purely functional disorder, and makes them essentially distinct from cases of general paralysis, which he considers as dependent upon a structural, organic change of the cerebral tissue. I believe, however, that softening, such as has been observed in the cortical substance of the brain, to which he attributes paralytic insanity, is far from being admitted by pathologists as a primary, idiopathic affection. If this softening is not entitled to be so regarded, the paralytic symptoms cannot be properly referred to it as their cause, but to some anterior morbid action of which it is the result. Dr. Calmeil* considers this morbid action to be inflammatory in its nature, and has given it the name of chronic diffused peri-encephalitis. The same author describes cases of the acute cerebral affection which has been already mentioned under the name of acute delirium, as acute peri-encephalitis under the insidious form. The resemblance of congestive mania to that affection has already been spoken of, and it appears to me that it occupies the position of a connecting link between the acute and chronic forms of the same cerebral disease, viz. a congestive or inflammatory affection of the cortical cerebral substance, in its most acute form, running a rapid course, and generally terminating fatally from the eighth to the fourteenth day, sometimes in its milder forms ending in apparent recovery, but frequently passing into the variety of chronic mania which I have been engaged in describing, and sometimes ending in general paralysis. All may not be agreed upon the inflammatory nature of the affection, but the fact that it is constantly accompanied with cerebral congestion will perhaps not be denied by any one, and the word *congestive*, expressing this fact, though possibly not fully indicating the nature of the disease, appears to me to be highly appropriate, as well as convenient, for designating those cases in which the paralytic symptoms are absent. It has been proposed for this purpose by Dr. Baillarger, in whose opinion this form of mania frequently terminates in paralytic dementia, to which it bears the same relation that simple mania does to simple dementia." (*American Journal of Insanity*, Oct. 1860.)

6.—*Hysteria and Hysteromania.*

An anonymous writer in the *American Journal of Insanity* (October, 1860) introduces a report of several interesting cases of hysteria and hysteromania, by the following remarks:—

"Much has been done to render medical science more simple and precise, in the withdrawal from several classes of disease, which embraced a large number of diverse and obscure symptoms, of special

* *Traité des Maladies inflam du Cerveau*, vol. i, p. 261.

groups of these, dependent upon some pathological or other proximate cause, whence they might be appropriately named. Thus in the progress of science, from the hypothetical disease insanity have been taken the better defined maladies, of mania à potû, general paralysis, and softening of the brain. If there have also been added to insanity a number of special varieties, each representing a single form of moral perversion, this error in classification is likely to be soon abandoned. The same is true of epilepsy, which remains an ideal type of disease, while epileptiform convulsions, frequently found to be dependent upon certain cerebral lesions, toxic agents, or points of irritation, in numerous instances are not included under this name. It would seem expedient to follow a similar method in treating of hysteria, and it is matter of surprise that this has not already been done. We would thus denote by the name hysteria, a disorder marked not only by great nervous excitability, shown in spasm or convulsion, but also a perversion of the emotional nature, with more or less impairment of the voluntary powers. Simple convulsion, even of the kind most common in hysteria, would not then be termed hysterical, unless connected with moral or volitional disturbance, and no disorder of the cerebral functions would be classed under this head, unless conjoined with a morbid state of the spinal nervous system. Thus, in a case of hysteriform convulsions following some sudden sensation, or some new and entirely unsolicited emotion—the primary hysteria of many writers—we would not admit the term. If this exclusion were general, many chaste and right-minded women, who chance to have suffered a peculiar form of convulsion, would escape an unjust imputation; while in many others, whose nervous functions were unimpaired, might be recognised the premonitions of insanity or the proofs of a vicious nature, both of which are too often passed by under the disguise of an unmeaning term. In the so-called secondary hysteria, following upon emotions voluntarily preferred, or upon the spontaneous recurrence of those before indulged, or from sympathy with morbid emotions in others, the disorder should alone be recognised.

“By hysteromania we do not mean a condition of ‘moral insanity,’ marked by ‘irresistible impulses’ to the intensest egotism, to mendacity, and sexual gratification, but a true mania, developed upon a state of hysteria, to which it bears the same relation that mania à potû does to habitual drunkenness, the ‘oinomania’ of certain writers. In confirmed inebriety, as in hysteria, there is a morbidly powerful passion, with which a correspondingly weakened volition has to contend. But principles of conscious right and of the soundest policy, hold the individual responsible for the actions which follow. The first stimulus to the growth of the passion in each case, was, or must be presumed to have been, voluntarily applied, and the loss of the determining power of the will can only be proved by positive symptoms of cerebral disorder. This will no doubt be more readily assented to in reference to drunkenness than to hysteria. In those rare cases of drunkenness, resembling most closely paroxysms of mania, the gratification to be obtained is one in some degree conceivable by nearly all who are called to pass upon the responsibility of the subject. But in

the worst forms of hysteria the desire from which all the almost supernatural efforts flow, is utterly foreign and incomprehensible to the common mind.

"The limits of hysteria and hysteromania are then to be determined, as in deciding between confirmed inebriety and mania à potû, by the presence or absence of actual lesion of the mental faculties, implying a coercion, not a surrender or a depravation of the will."

7. *Hypochondriacal Insanity as a Precursor of General Paralysis.*

By M. BAILLARGER, of the Salpêtrière, Paris.

GENERAL paralysis is a common and most serious phase of mental disease. It attacks patients of all ages, and its progress towards a fatal termination exhibits stages of the most melancholy and humiliating nature. All medical men are of accord that it is most insidious in its approach. It may be long in becoming fully developed, presenting at first only the most trivial indications, in many cases so trifling as to pass altogether unobserved; and when the malady does at last attract attention, it may be too late for arresting its advance. It is therefore most important to attend to this disease at the very first; and it is with this object that it seems useful to describe the intimate relation existing between the hypochondriacal form of melancholia and general paralysis.

This relation being understood, it becomes one means of detecting the advent of that disease at the very commencement of its attack. It is of importance to distinguish this symptom, as the melancholy accompanying general paralysis very much resembles melancholia in its simple form. The conceptions or illusions of the hypochondriac, however, although of considerable variety, are yet of such a tendency as often to present something of a special character in their nature. The patients believe that their various organs are changed, destroyed, or completely obstructed: they pretend, for example, to have no mouth, no abdomen, no blood—that their gullet is stopped up, their stomach quite full, their bowels shut up; they imagine that their food passes from its ordinary channels—that it gets into their skin, or even their clothes. Four patients believed their body to have become putrid. Many among these patients are afflicted with hallucinations of the sense of smell. Some keep their eyes closed, and allege that they are blind; others cease to speak, and state afterwards that it was impossible for them to open their mouth; they assert that they cannot either swallow, or defecate, or make water; they affirm that their members are altered—that they are larger or smaller; they say that they do not exist, or even go so far as to believe themselves dead; they remain motionless, the eyes shut and when their limbs are lifted they let them fall, as if completely paralysed. These different delusions lead to serious consequences: many of the patients refuse, more or less obstinately, to take food, and sometimes it becomes necessary to feed them by means of the stomach pump; such patients speedily become much emaciated. I have

seen, M. Baillarger states, a lunatic die in eight days from obstinately resisting the employment of the stomach pump, under the impression that his stomach was completely full, and his gullet obstructed. One patient pretended he could not make water, and used every effort to retain it; his bladder became enormously distended, and he was at last attacked by a veritable retention, and it was with great difficulty the catheter could be used. In the end a false passage was made, and the patient died, while yet in the first period of the disease.

The tendency to gangrene, which is one of the characteristics of general paralysis in its latter stages, exists in these cases markedly, and before its usual period. Four cases had large eschars over the sacrum, without ever having been confined to bed; one woman, who for a year had exhibited all the symptoms of commencing general paralysis, preserved every appearance of health in other respects, when, all of a sudden, she became affected with hypochondriacal melancholia, and six weeks afterwards died of gangrene in both feet.

Hypochondriacal delirium is thus not only a mere premonitory symptom of certain forms of paralysis, but it is a serious symptom, and one very unfavourable, in prognosis.

In reference to this affection—viz., that of hypochondriacal insanity—viewed as one of the precursors of general paralysis, this being the fact of most practical value in connection with it, the delusions of which we have spoken seem to claim especial attention, as they are sometimes to be detected in patients as yet evincing no indication of paralysis,—this supervening at a later period. Such a termination is certainly not invariable; but it is so common after this symptom, and the prognosis in such cases is so unfavourable, that considerable importance seems to attach to the subject. Thus Dr. Combes published some remarks on a case of lypemania, with stupor, and other serious symptoms,—nothing, however, indicating that at a later period this patient would be attacked with paralysis; and, after fifteen months' residence in this asylum, where he was treated, he was dismissed as cured. In reading Dr. Combes' remarks, I was struck, observes M. Baillarger, with certain of the delusions affecting this patient. He had believed that he was about to die, if indeed he was not already dead; that his limbs were atrophied, that he had none, &c. These appearing to be good grounds for suspicion, I wrote to Dr. Combes to know what had become of the patient. The answer confirmed my suspicions—the result having been that, after a year's return to his occupations, he had been attacked with general paralysis. We may see by this example, that, had hypochondriacal delirium been held as a certain precursor of general paralysis, this affection might have been foretold two years before it actually took place.

It may appear strange that one form of insanity should thus be urged as premonitory of paralysis. Singular as it may seem, however, it is not the first time that such a doctrine has been urged. Since the writings of Bayle, no medical man doubts the fact of certain forms of insanity, such as the ambitious form, being symptomatic of approaching paralysis. And if one form of delirium be held, in mania or monomania, as indicating the advent of paralysis, there seems no reason

why this particular hypochondriacal form should not serve the same purpose, and with equal certainty, in melancholia.

We do not attempt to explain these facts; and we may add, it seems useless to do so, either here or in the case of ambitious insanity. One point connected with the ambitious form may be mentioned; and that is, the relative frequency of general paralysis among females in different ranks of society. While this malady is equally common among males of all classes, among women it is not so. It is very common among the poor, and very rare among the rich. It would appear, however, that this circumstance has been forgotten by those who would explain the greater number of cases of ambitious insanity as induced by ideas of speculation—by the desire of suddenly arriving at honours and fortune.

In conclusion, it appears evident that hypochondriacal no less than ambitious insanity may, in different circumstances, be considered as a prognostic of general paralysis. The intention of the present paper has accordingly been to direct attention more particularly to the latter of these forms. As for the first, I have frequently had occasion, before now, to refer to it in all its remarkable psychological characters. —*Annales Médico-Psychologiques*, Oct. 1860.

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ART. I.—ON THE MORAL PHENOMENA OF INSANITY AND ECCENTRICITY.

By THOMAS MAYO.

A STATE, which may seem to deserve the name of Moral Insanity, as exhibiting a perversion of the moral sentiments, tendencies, and perceptions, with no slight loss of self-control, must be recognised as often prominent in the early stage of mental disease, and before the intellect is palpably affected. When certain delusions, when delirium or incoherency supervene, the case obtains without question the name of insanity. While most cases begin in this way, a very palpable difference of a practical kind is made by many reasoners in nomenclature; some extending the epithet insane to all those who exhibit these moral phenomena, whether combined with intellectual perversion or not; others refusing to assign it, unless the intellectual lesion be also patent in the case. Up to this point in the history of mental affection the patient must be held, in their opinion, personally responsible for his conduct in a criminal sense; while, with those who are disposed to give moral phenomena an equal weight as pathognomonic of insanity with those of the intellect, the moral phenomena which, with the former, are only recognised as having been insane, when an intellectual aberration has also occurred, are at once recognised as possessing an independent right to constitute a lunatic.

The grounds on which an intellectual as well as a moral aberration are deemed necessary, where insanity is presumed to confer

irresponsibility in regard to crime, appear to me good. I have seen no reason to question the importance of this rule, which certainly tends to maintain the boundaries of vice and madness,—so that a murderer should not escape justice on this kind of plea, unless he had superadded to the phenomena of moral disorder those of intellectual disorder; the assumption which underlies this argument being that so long as his intellect is unperverted, he will be found to possess a consciousness of the nature of the criminal act in relation to law. This has been argued by the writer of the present essay and by others, and appears to be a prevalent doctrine with the judges. But it does not form my present object to carry it farther. I wish to guard against a certain apparent parity of reasoning which may leave both the patient and the public unprotected, should the moral symptoms of insanity obtain no recognition from the law until intellectual perversion has been recognised.

I have assumed that the patient may not with safety to society be considered legally irresponsible as mad while the moral stage, or what shall appear to be the moral stage, of the disease is alone perceptible in his motives and actions. But can the law give him no protection until then? He may destroy the comforts of his family and ruin their fortunes and his own; he may have become a bad father, a savage husband, a profligate and licentious member of society, and a total change of character may have occurred with these symptoms; but no false perceptions, no amount of delirium or incoherency may have given evidence that he is mad, on the principles on which I am supposing that state to be made good in the strict meaning of the term,—here is a difficulty which must not be overlooked, in connexion with the above distinctions. In a word, I wish to establish the point, that a different practical criterion must be sought for as to what insanity means, where the case in question is one, in which the agent is claiming protection against the consequences of a crime, on the ground that he is irresponsible,—and where he and his family are claiming protection for themselves and surveillance for *him*, on the ground that he is unfit to manage his person and property. We cannot wait to clear up the question whether the definition of insanity, such as it ought to be, has been accomplished in the supposed case, so as to enable us to coerce it by a certificate of unsoundness of mind, before it has reached a *Cenci dénouement*, or such an one as Feuerbach brings forward in his work on jurisprudence, in which the lives of a whole family were saved by their concurring to put to death a homicidal father. The law will not permit the idea of insanity in the agent to plead his excuse when it knows that he is perfectly aware of the murderous tendency of his actions, and in being unable to resist them is only in the same predicament with every recognised aspirant to the gallows. On the other hand, while it refuses to him the

protection of a madhouse against the consequences of his criminal acts, it will feel—certainly it ought to feel—averse to deny him the preventive protection of a madhouse, when his friends claim it for him, both for his sake and their own, before a guilty outbreak has occurred.

I have observed that the judges of the land are willing to accept the definition of insanity, which I claim as appropriate when the plea is to confer irresponsibility; and they are right; but they will cease to be right, if they do not award the privileges of insanity at a less advanced stage of it when such may be the results of restraint and coercion.

There is no subject in which the inability of language to make good *practical distinctions* is more felt than in this. It expresses the tendencies of the rules to be laid down, rather than the exact occasions for their application. Thus, when irresponsibility in criminal cases has to be conferred on the *actual* delinquent with due protection to the interests of the public, the definition of insanity in its completest form must be predicated of him; where all that is required of the law amounts to the protection of the *possible* delinquent's person and family, it would appear quite sufficient that a case should be made out of inability to control such conduct as may reasonably be expected to culminate in insanity. It must be admitted that the variety of terms assigned in the medical certificates for the use of witnesses in designating mental lesion facilitates this operation.

Thus both social and individual interests require that the moral phenomena of insanity should be permitted to justify coercion and surveillance when the moral symptoms of insanity alone are present; and such are the considerations by which it appears to me that the doctrine of moral insanity should be estimated by the law. In this point of view, it is the early period of yet imperfect insanity; and thus viewed, it is not one head of a division of which insanity is the genus, as Pinel considers it, but a state almost always recognisable in the early condition of those who eventually become insane—though not always proceeding into that development or obtaining the genuine characteristic of the formed disease, viz., the intellectual lesion. The question whether a phase of this moral perversion justifies us in leaving it under the cognate condition called eccentricity, or contains, though dimly perceived, those elements of deficient self-control which we may deem, not indeed exculpatory of criminal acts, but justificatory of our protecting the patient against himself—this question is full of difficulty. To an experienced psychologist there may be strong grounds in a given case, and that in very early life, for suspecting that a false perception underlies what he would willingly call eccentricity. How

may such phenomena be distinguished from eccentricity, so that the interference of the law may not become an unjustifiable interference with liberty or an unnecessary stigma to future life? The amount of self-control possessed by the patient must be taken into the account in reference to the probability that any such morbid perception should gain the mastery over him. It will often be an important indicant that such morbid impressions underlie his eccentricity, if he is noticed to make motiveless but voluntary gesticulations; if talking to himself he is observed to be occasionally talking to some one else, some imaginary personage; apparently motiveless conduct is always suspicious. An unreasonable fancy that he is watched and noticed is the rudiment often of a deep-rooted conviction that there is a conspiracy against him—one of the most frequent maniacal fancies when the intellectual development of the disease has been reached. Meanwhile the class which I am describing is not the less under these singular influences, because they can sometimes play with them or use them with a cunning purpose. It is indeed difficult to find one's way through the intricacies of the *perverted* phenomena acting on the more *normal*. The late Dr. Warburton and I were requested by our friend, the late Dr. Monroe, with his usual solicitude on behalf of his patients, to help him towards solving a doubt which he entertained respecting the *existing* state of one of his patients. The man had laboured more than once under unquestionably insane symptoms. But we ascertained that he was well aware of his state, as well as of the opinion entertained by the world in regard to such symptoms; and being a profligate and unprincipled fellow, knew how to encourage their evolution, when they were called for, by some infamous gratification or indecent *bizarrierie*, as he much preferred an establishment to a prison, which, *as a perfectly sane man*, he would have frequently incurred. He had divested himself of his abnormal symptoms to a remarkable degree when we saw him, and Dr. Monroe had been urgently called on to let him out by his unfortunate wife, because on his eventual enlargement, if not then permitted, he would, she said, terribly revenge himself on her.

Doubtless, these symptoms, wavering between eccentricity and insanity, but combined with vicious propensities, are often received into an asylum, when a prison would be more appropriate. I was told lately by Mr. Pownall, Chairman, I think, of the Brentford Quarter Sessions, the following anecdote respecting Oxford, who afterwards attempted the Queen's life. Some time before that act he was brought before Mr. Pownall and another magistrate, on account of some very eccentric cruelty shown towards some fowls; and for this offence let off with a reprimand. Seeing Mr. Pownall some time afterwards, when in the penal

wards of Bedlam—"Had you," said Oxford to that gentleman—"had you punished me when I was brought before you for that former offence, I should not now have been here."

In this point of view, the case of the Hon. Mr. Tuchet was probably a sad instance of mismanagement, both legal and educational. Mr. Tuchet wantonly shot the marker in a shooting gallery. Before this event, while this young gentleman was on the town in a state of progressively increasing discontent and *ennui*, if the eye of science had been brought to bear upon him, the observer might have possibly seen good reason for calculating upon his exhausting his powers of self-control so far as to acquire good grounds for claiming the protection of the law, before he had rendered his claim to that protection questionable or inappropriate by an act which, at that stage of abnormal conduct, assumed all the frightful character of murder. It is difficult, without more knowledge than we possess of the antecedents of this gentleman, to substantiate completely our hypothesis, but it may be plausibly suggested that he was protected by the decision of a court of justice from punishment for a great crime on the plea of insanity, instead of being prevented from committing that or similar crimes by early surveillance and detention. Meanwhile, the punishment which he thus escaped was *legally* deserved, as he unquestionably well knew the murderous nature of the act which he committed at the moment of commission.

We are liable to the imputation of throwing out an intricate and entangled view of a subject, of which, however, the importance must be admitted. It must be remembered that no chart at present exists to guide us through the contra-indicants which embarrass us in our attempts to reconcile punishment with justice, where some amount of unsoundness of mind is admitted to exist—and coercion with the liberty of the subject, where the power of thought, though weakened, is not abolished. Whatever is the value of the distinctions which I am endeavouring to lay down, it is a painful reflection that the applying them in practice is left to so imperfect a method as the trial by jury. Surely this is a task which better befits the judges of the land.

If in the above remarks I have maintained the opinion that insanity is incomplete as a ground of protection to delinquents, so long as its symptoms are ethical alone, and not intellectual also, I have not the less considered that it often requires to be made the subject of coercion and surveillance long before any unequivocal evidence of diseased intellect exists. This view opens out a large vista of duties belonging to the psychologist who presides over an asylum, both as to deciding when he may justly consider that its restraints, skilfully managed, will be applicable to a given case, and as to modifying the nature of those restraints

and the modes of pleasure, comfort, and encouragement which the patient can bear, so that such patients may be tempted to take refuge in an asylum rather than be taken to it. In this way, and fulfilling these conditions, the proprietor of an establishment may well lay claim to a very high position among the practical philosophers of a country. The habits of mind which he thus forms may not only cure a morbid state, but develope unrecognised mental powers.

Nearly allied with these views, I may mention a very important change which is wanting in the entire education of this country. Certainly, as applied to the higher classes, it assumes as its object the regulation of character contemplated only in its normal state. The *ordinary* vices of the young obtain correction; but of the *extraordinary* and *eccentric* or *abnormal* elements of defective characters the school or college is kept ostentatiously clear. That is to say, the persons labouring under them are not treated, but expelled; and yet such persons, not deserving to be called mad, form a large element of society. I will illustrate these remarks by a few cases, with the treatment which they have appeared to suggest. I was consulted, many years ago, respecting a boy who, as he emerged out of childhood, showed a strong tendency to low company, unreasonable likes and dislikes, to what may be called general recklessness of character, and deficient sympathy with others; at the age of about thirteen he was sent to Rugby, and in a short time expelled from it, not roughly or depreciatingly, but as a case out of their department of education. But what was to happen next? It had clearly become a case for the discriminating management of a private tutor. But the private tutor, a clergyman of course, was equally worsted. A respectable farmer was next had recourse to, as likely to gratify the boy's taste for lower company than appertained to his social position, in the most creditable, or least discreditable, way. But this was turned by him to a bad account; and now sottishness and low company were closely besetting him. Consulted by his mother, I told her that the medical profession afforded to its members a larger knowledge of the human mind, than the church, the farm house, or the public school, and that this knowledge was wanted to him who should pretend to manage her son; and I promised to look out for some young member of our profession, who would undertake to travel with her son. The plan was accepted, and it answered; that is to say, a downward progress was arrested, and the subject of it was raised to a much higher pitch of moral worth and steadiness of character in which he has since remained. But a gentlemanlike tone of mind has never been reached by him.

In another case of the same kind, circumstances permitted me

to adopt a much bolder plan. He was a boy, aged about seventeen, who had by that time defeated almost every system of education, and had a fair chance of bringing himself to prison or the gallows, unless certain tendencies to indecency and to violence in his character either became sufficiently marked to render him irresponsible as an undoubted maniac, or could be arrested or placed within his control. This was in the year 1831. A very excellent establishment in my neighbourhood, in which I believed he might obtain this wanting education, as well as the positive restraint which some recent outbreaks appeared to justify, on the plea of unsoundness, gave me the means of subjecting this youth to the firm and passionless surveillance which only an asylum, or a place conducted in some measure on the principle of an asylum, can afford. The proprietor of it was well known to me as a gentleman of excellent judgment and an amiable character.

I took him to this establishment, in 1831, accompanied by his father and another relative, showed him at once into his apartment, and briefly told him why he was placed there, and how inflexible he would find his restraint until he should have gained habits of self-control. At the same time I pointed out to him the beautiful and wide grounds of the establishment, and the many enjoyments which he might command by conformableness. This I stated to him, in the presence of his two relatives, whom I then at once removed from the room. When I saw him about an hour afterwards, the nearest approach that he made to surprise or regret, was the expression, that "he never was in such a lurch as this before."

For about a fortnight he conducted himself extremely well. He then lost his self command, kicked his attendant, and struck him with a bottle of medicine. On this I went over to see him. He vindicated himself with his usual ingenuity, but looked grave and somewhat frightened when I told him that, if he repeated this offence, he would be placed under mechanical restraint, not, indeed, as a punishment, but as a means of supplying his deficiency in self-control. He expresses no kindly or regretful feeling towards his relatives; but confesses the fitness of his treatment and confinement. It appears to me that he is *tranquillized* by his utter inability to resist. From this time, during his stay at the establishment, which I continued for fourteen months, no further outbreak against authority took place. He ceased to be violent, because the indulgence of violence would imply risk of inconvenience to himself, without the comfort, which he had formerly derived from it, in exciting the anger of his friends and giving them pain. His attempts at sophistry were thrown away upon us; his complaints of the hardship involved in the nature of

the restraints imposed upon him, namely, the limitation to the grounds of an establishment, regular hours, and the constant presence of an attendant, were met by a calm affirmation that he had himself admitted the necessity of some control, and that he had surmounted every other form of it. I encouraged correspondence with myself; but when any one of his letters was insolent and wayward, I declined accepting the next letter until some time should have elapsed. He read much—for we supplied him with books; and I sometimes engaged him in literary conversation. Two or three times I obtained from him a tolerably well construed Latin lesson. This, however, was to him a school of moral rather than intellectual advancement. A sustained attempt at tuition would have supplied, under present circumstances, too many opportunities of irritation between the teacher and the scholar. The *temper* requisite for the reception of knowledge and the cultivation of the intellect was *being formed*, and could not safely have been *assumed*. The same consideration induced me to postpone to him the motives and sanctions of religion. It gradually became observable, both to myself and the proprietor of the asylum, that he was becoming comparatively happy. He entered freely, and with little acrimony, into conversation with us. His complaints of the injustice of his detention became formal, and assumed the character of lodging a protest rather than making a remonstrance. Sometimes he very ingenuously admitted the freedom from unhappiness which he experienced in his present state, and compared it favourably with that in which he had previously lived, always wretched himself, but occasionally enjoying the miserable comfort of making others yet more wretched. In the course of several of my interviews, I observed the valuable influence exercised upon him by the fear of becoming irregular in mind through the indulgence of intemperate violence. The establishment itself had supplied him with a few cases in point. One young man, who had struck his father, and from that time was a wretched maniac, drew his attention.

He generally dined alone. Occasionally, and by invitation, with Mr. N——'s family. He associated with some of the patients. He never made any attempt to escape from the place, in fact, he felt himself mastered, and submitted.

After he had been about a year in this place, he exhibited a trait of character which gave us pleasure. We found that he had given ten shillings to an attendant, by whom we had reason to believe that he had not been respectfully treated.

But the increasing quietness with which he adverted to, and remonstrated against his detention, most tended to assure us that we might soon bring it to a close.

The time indeed was now arriving at which it seemed reasonable to bring to a conclusion a method of treatment, which nothing could have justified in the case to which it was applied, except the extreme importance of the principle which it embodied, and the difficulty of finding any other means of carrying that principle into effect. Towards the end of the fourteenth month of his stay I obtained for my young friend, as a private tutor, a gentleman in whose family he should reside on leaving the establishment with three or four other private pupils; and I determined he should be removed thither by one of those relatives who had conveyed him to the establishment. At the private tutor's my young friend was considered gentlemanlike and companionable; if opposed and thwarted, showed no symptoms of his ancient violence; waywardness was discoverable occasionally, but was no longer a property which defied self-control. On leaving his tutor's at the end of about a year, in order to commence professional studies, he dined and slept at my house, and conducted himself in a cordial and agreeable manner.

In order that the successful issue of this case, verified as it has been by my subsequent inquiries, may not place the system under false colours, I may observe that I do not think it could have been carried out in this form but for certain points of character existing in the patient which adapted him to the treatment applied. Without possessing active courage, he had much firmness and power of endurance; and although his scanty moral principle had not given him habits of veracity, yet he possessed in a high degree the tendency to think aloud; he was naturally frank. Indeed the openness with which he would let out those thoughts, which it was most his interest to keep secret in his evil days, was in constant contrast with the perfect unfairness and disingenuousness of his arguments in support of *them* or in vindication of his conduct. Now, the firmness of his character enabled him to endure what would have shocked weak minds—the name of a madhouse; while his frankness made it impossible for him to conceal his thoughts and feelings, and thus enabled both myself and the excellent proprietor of the establishment perfectly to estimate the effect of our measures on his character while they were proceeding.

“*Quis teneat vultus mutantem Protea nodo?*”

In the above remarks I have endeavoured to accomplish this kind of difficulty; for I have endeavoured to discover means of identifying the moral phenomena of the insane state, as distinct from those which may be left to the expressive term *eccentricity*. And at the same time I have proposed to establish certain practical relations between these states through a modified application of the same principles of treatment to both.

ART. II.—THE CLASSIC LAND OF SUICIDE.

THERE was a time when it was customary, both at home and abroad (and we are not quite certain that the custom as yet has quite died out among ourselves), to look upon England as “the classic land of suicide.” “La terre classique du suicide,” was a phrase of our immediate neighbours across the straits as applied to this country; “O Britain, infamous for suicide!” sang one of our most popular poets.* A better knowledge of the subject has, however, pretty clearly established that, in this respect, we belied ourselves, and suffered others to belie us. With that happy facility for parading our shortcomings which is so incomprehensible to other nations, we, before the era of statistics, succeeded in imposing as well upon our neighbours as ourselves the belief that suicide was in an especial manner a bane of this kingdom. We now know that there was no sufficient ground for this belief before statistical returns could be appealed to, and that since these have existed, the unenviable pre-eminence of being the chief haunt of suicide can no longer be assigned to England.†

But we should gain little by getting rid of this stigma, if, to the poetical literature of this kingdom is to be attributed, as certain continental writers will have it, a primary influence in the development of that æsthetical treatment of suicide which has been one of the most curious phases of the literary history of the past eighty years.

According to Goethe, that life-weariness so productive of suicide, which was widely prevalent among the German youth, and indeed the youth of other continental nations, towards the termination of the last century, would not have been so decidedly manifested had it not been for the action of an outward cause. Such a cause existed for them, he states, in English literature, “especially the poetical part, the great beauties of which are accompanied by an earnest melancholy which it communicates to every one who occupies himself with it. . . . One finds in it throughout a great, apt understanding, well practised in the world, a deep, tender heart, an excellent wit, an impassioned action,—the very noblest qualities which can be praised in an intellectual and cultivated man: but all this put together still makes no poet. Fine poetry announces itself thus, that, as a worldly gospel, it can by internal cheerfulness and external

* Young, *Night Thoughts*; Night v. l. 442.

† See Brierre du Boismont, *Du Suicide*, p. 368; *Journal of Psychological Medicine*, vol. xii. p. 216; Marc d'Espine, *Statistique Mortuaire Comparée*, pp. 96—101.

comfort free us from the earthly burdens which press upon us. Like an air-balloon, it lifts us, together with the ballast which is attached to us, into higher regions, and lets the confused labyrinths of the earth lie developed before us as in a bird's-eye view. The most lively, as well as the most serious works, have the same aim of moderating both pleasure and pain by a felicitous intellectual form. Let us only in this spirit consider the majority of the English poems, chiefly morally didactic, and on the average they will only show us a gloomy weariness of life. Not only Young's *Night Thoughts*, where this theme is pre-eminently worked out, but even the other contemplative poems, stray, before one is aware of it, into this dismal region, where the understanding is presented with a problem which it cannot solve, since even religion, much as it can always construct for itself, leaves it in the lurch."

In further illustration of this position Goethe refers to Milton's *Allegro*, in which gloom has to be scared away in "vehement verses" before even moderate pleasure can be attained; and to the *Deserted Village*, in which the cheerful Goldsmith, losing himself in elegiac feelings, "as charmingly as sadly exhibits to us a lost Paradise which his *Traveller* seeks over the whole earth." Giving us credit for at least some cheerful poetry, he adds:—

"Enough: those serious poems, undermining human nature, which in general terms have been mentioned above, were the favourites which we sought out before all others, one seeking, according to his disposition, the higher elegiac melancholy, another the heavy oppressive despair, which gives up everything. Strangely enough, our father and instructor, Shakspeare, who so well knew how to diffuse a pure cheerfulness, strengthened our feeling of dissatisfaction. Hamlet and his soliloquies were spectres which haunted all the young minds. The chief passages every one knew by heart and word to recite, and everybody fancied he had a right to be just as melancholy as the Prince of Denmark, though he had seen no ghost, and had no royal father to avenge."

Finally, *Ossian* had charmed them "even to the *Ultima Thule*."*

Again, Brierre du Boismont tells us that Shakspeare is the source of the æsthetical literature of suicide of our own times. "Thus," he writes, "Hamlet cries:—

"To die;—to sleep;
To sleep! perchance to dream;—ay, there's the rub.

* *Autobiography*, translated by J. Oxenford; Bohn. Vol. i., pp. 504—7.

Already in this [poet are found the principal features which characterize that literature: the dread of death and doubt of the future."* Pierre Leroux also writes in his observations upon the poetry of our epoch—"Shakspeare leads the choir of poets, Shakspeare who had conceived doubt in his breast long before philosophy. Werther and Faust, Childe Harold and Don Juan follow the shade of Hamlet, followed themselves by a multitude of despairing and lamenting phantoms, who all seem to have read the terrible legend over hell's gates, *Lasciate la speranza*."†

But, truly, it would be no easy task to trace in what manner the "earnest melancholy" which tinctures the writings of our great poets could, as Goethe asserts, become the fostering cause of that self-cultivated, self-indulged life-weariness, the prime factors of which were irreligion and scepticism, the prime result immorality, the most revolting one suicide. In no respect would the task be lighter to search for and discover in Shakspeare the source of our modern æstheticism of suicide; or to show that Werther was directly descended from Hamlet.

It is customary when looking upon a muddy stream to attribute the muddiness to the nature of the banks between which the water flows; or when gazing through a fog upon the distorted outline of a coast, to ascribe the distortion to the fog. Certainly it may be said that without the water there would be no turbid stream; without the coast no distorted coast-line. And so of the influence exercised by the poetic literature of this land upon the "Young German Mind" in Goethe's time. It may have been, as he would have us believe, that but for this literature the life-weariness which then infected the youth of his country would never have become so greatly developed as it did become. Yet who would now recognise such a source in the noxious literature which is the most enduring expression of that life-weariness, and of which *Werther* is the first-begotten and type? The source may be there, but whence the pollution? The coast may still appear above the horizon, but whence its fantastic contour? This is to be sought in the then mental state of the German youth, which, as a crumbling bank, or a thick haze, muddied or distorted whatever passed over or was seen through it.

That profound religious element which permeates and governs the grave tone of the *Deserted Village* and *Traveller*, and which is the great motive and key of the *Night Thoughts*, is dismissed by Goethe as only worthy of the brief consideration of a sneer; and that seriousness which in a Christian is presumed to be the

* *Du Suicide*, p. 173.

† *Werther*, edited by P. Leroux, with a preface by George Sand, p. xxviii; and *Revue Encyclopédique*, 1851; *De la Poésie de notre époque*.

best safeguard and best fosterer of morality, is looked upon by him as "undermining human nature." This is true to the dominant intellectual spirit of the time of which Goethe wrote, when, as Carlyle forcibly sums up,—“Whatever belonged to the finer nature of man had withered under the Harmattan breath of Doubt, or passed away in the conflagration of open Infidelity; and now, where the Tree of Life once bloomed and brought fruit of goodliest savour, there was only barrenness and desolation. To such as could find sufficient interest in the day-labour and day-wages of earthly existence; in the resources of the five bodily senses, and of Vanity, the only mental sense which yet flourished, which flourished, indeed, with gigantic vigour, matters were still not so bad. . . . But to men afflicted with the ‘malady of thought,’ some devoutness of temper was an inevitable heritage; to such the noisy forum of the world could appear but an empty, altogether insufficient concern; and the whole scene of life had become hopeless enough.”* These men, thus afflicted, accustomed themselves (to use a phrase of Jaques), “to suck melancholy out of a song, as a weasel sucks eggs;” and they made the older poetical literature of this country minister to this passion, by straining off that high moral feeling which gives significance to the sadness that characterizes the greater bulk of it, and retaining the mere dregs of a meaningless melancholy. To minds thus tinctured Ossian would fittingly “take the place of Homer in the heart and imagination.”†

If we would more thoroughly understand the extent to which the nature of the melancholy which so largely prevails in the older poetical literature of this country, as well as the signification ordinarily attached to the word by our most trusted writers, have been misconceived by Goethe, and from the causes we have assigned, illustrations are readily found.

“That calm and elegant satisfaction,” writes Steele, “which the vulgar call melancholy, is the true and proper delight of men of knowledge and virtue. What we take for diversion, which is a kind of forgetting ourselves, is but a mean way of entertainment, in comparison of that which is considering, knowing, and enjoying ourselves. The pleasures of ordinary people are in their passions; but the seat of this delight is in the reason and understanding. Such a frame of mind raises that sweet enthusiasm, which warms the imagination at the sight of every work of nature, and turns all around you into picture and landscape.”‡

Again, and still more to our purpose, Mackenzie writes, at a period when *Wertherism* was in progress of development,—

* *Miscellanies*: Art. Goethe.

† *Werther*, Octr. 12.

‡ *Tatler*, No. 89, Nov. 3, 1709.

"You say truly, in one of your late papers [referring to a previous number of the *Lounger*], that poetry is almost extinguished among us: it is one of my old-fashioned propensities to be fond of poetry, to be delighted with its descriptions, to be affected by its sentiments. I find in genuine poetry a sort of opening to the feelings of my mind, to which my own expression could not give vent; I see, in its descriptions, a picture more lively and better composed than my own less distinct and less vivid ideas of the objects around me could furnish. It is with such impressions that I read the following lines of Thomson's *Autumn*, introductive of the solemn and beautiful apostrophe to philosophic melancholy:—

"But see the fading many-coloured woods,
Shade deepening over shade, the country round
Imbrown; a crowded umbrage, dusk and dun,
Of every hue, from wan declining green
To sooty dark. These now the lonesome Muse,
Low-whispering, lead into their leaf-strewn walks,
And give the season in its latest view.

Meantime, light-shadowing all, a sober calm
Fleeces unbounded ether; whose least wave
Stands tremulous, uncertain where to turn
The gentle current; while illumined wide,
The dewy-skirted clouds imbibe the sun,
And through their lucid veil his soften'd force
Shed o'er the peaceful world. This is the time
For those whom wisdom and whom nature charm
To steal themselves from the degenerate crowd,
And soar above this little scene of things;
To tread low-thoughted vice beneath their feet;
To soothe the throbbing passions into peace,
And woo lone quiet in her silent walks.

"About this time three years, sir, I had the misfortune to lose a daughter, the last survivor of my family, whom her mother, dying at her birth, left a legacy to my tenderness, who closed a life of the most exemplary goodness, of the most tender filial duty, of the warmest benevolence, of the most exalted piety, by a very gradual but not unperceived decay. When I think on the returning season of this calamity, when I see the last fading flowers of *Autumn*, which my Harriet used to gather with a kind of sympathetic sadness, and hear the small chirping note of the flocking linnets, which she used to make me observe as the elegy of the year; when I have drawn her picture in the midst of this rural scenery, and then reflect on her many virtues and accomplishments, on her early and increasing attentions to myself, her gentle and winning manners to every one around her; when I remember her resignation during the progress of her disorder, her unshaken and sublime piety in its latest stages; when these recollections fill my mind, in conjunction with the drooping images of the season, and the sense of my own waning period of

life; I feel a mixture of sadness and of composure, of humility and elevation of spirit, which I think, sir, a man would ill exchange for any degree of unfeeling prudence or of worldly wisdom and indifference.’”*

This fragment from the *Lounger* serves as the best interpretation to be attached to Steele's observations, and at the same time it teaches us in the happiest manner the meaning to be assigned to the melancholy which pervades the writings of our standard poets, and the great contrast between this meaning and the one which Goethe sought to affix to that emotional state as exemplified by their works. This melancholy, as is so exquisitely shown by Mackenzie's reflections on the death of his daughter, is but the reflex of a self-communing habit of thought which is accustomed to look upon all things as having a high moral significance. Hence it is that the moral element, inspired by religious belief, alone gives significance and vitality to the sombre thoughts of our great poets; and to dissociate this element from these thoughts, as Goethe does, is to render them utterly void of meaning.

Thomson, in his apostrophe to Philosophic Melancholy,† has so fully expressed the true *English* sense of the term, that it would be folly to attempt to convey this in any other language. He describes the approach of melancholy as being declared by the sudden-starting tear, the glowing cheek, the mild dejected air, the softened feature, and the beating heart, “pierced deep with many a virtuous pang.” A sacred influence is breathed over the soul, and the imagination inflaming, infuses every tenderness through the breast, and exalts the swelling thought far beyond the dim earth.

“Ten thousand thousand fleet ideas, such
As never mingled with the vulgar dream,
Crowd fast into the mind's creative eye.
As fast the correspondent passions rise,
As varied and as high : Devotion, raised
To rapture and divine astonishment
The love of nature unconfined, and, chief,
Of human race : the large ambitious wish
To make them blest ; the sigh for suffering worth
Lost in obscurity ; the noble scorn
Of tyrant-pride ; the fearless great resolve ;
The wonder which the dying patriot draws,
Inspiring glory through remotest time ;
Th' awaken'd throb for virtue and for fame ;
The sympathies of love and friendship dear ;
With all the social offspring of the heart.”

* *The Lounger*, No. 93, Nov. 11, 1786.

† Written A.D. 1730.

Such is a portraiture of the self-indulged melancholy which the English poet derives from nature ; but what traces of it can we detect in *Werther* ? Solely the tearfulness, the dejection, the inflamed imagination, and the host of fleeting ideas, but unballasted by any virtuous pang, by any high-souled tenderness, by any of that nobility of thought which religion pre-eminently gives, and which is shown in the abnegation of self, in that large-heartedness which ever seeks to succour and advance the human race, in a lofty patriotism, in a noble struggle for virtue and fame, or in the holy ties of domestic life.

What is absent in *Werther* is also absent from Goethe's estimate of the influence of English poetical literature in the production of *Wertherism*, that is to say, that whatever there is of excellence in the melancholy of our great poets is cast aside as worthless, and the mere unmeaning fact of gloominess retained.

And now to turn from the general question to the special illustration, and compare briefly Hamlet, the assumed prototype of the leading characters found in the modern æsthetical literature of suicide, with *Werther*, the earliest produced and chief of them.

Hamlet is depicted, first, as woe-begone at the loss of a much-loved father, and with his soul wrung by the incestuous marriage of his mother.

“ Within a month,—

Let me not think on't ;—Frailty, thy name is woman !—

A little month ; or ere those shoes were old,

With which she follow'd my poor father's body,

Like Niobe, all tears ;—why she, even she,—

O heaven ! a beast, that wants discourse of reason,

Would have mourn'd longer,—married with my uncle,

My father's brother ; but no more like my father

Than I to Hercules : Within a month ;

Ere yet the salt of most unrighteous tears

Had left the flushing in her galled eyes,

She married :—O most wicked speed, to post

With such dexterity to incestuous sheets !

It is not, nor it cannot come to, good ;

But break, my heart : for I must hold my tongue !”

Hamlet, thus woe-begone, and compelled to keep his griefs hid within his own breast, suffers an aspiration of regret to pass his lips that the Everlasting had “ fix'd his canon 'gainst self-slaughter.” And, again, when crushed by the horrible secret, brought to him from the nether world, of his father's murder, and the equally horrible duty imposed upon him by his father's ghost of murdering (for even the latitudinarian notions of revenge indulged in Hamlet's supposed time would admit no softer word for the act) his uncle, his mother's husband, he is represented as

once more resorting to suicide as a means of escaping from the "sea of troubles" which had overwhelmed him. But as his religious notions heretofore, so his reason, or as it is the custom to say, his philosophy, now rebuts, and that quickly, the notion. There is no tampering with the doctrine inculcated by the Church that suicide is a damnable sin, and by the State that it is a crime; there is no attempt to fritter away under paradoxes and conceits the, to reason, inscrutable question—

"To die; to sleep;
To sleep! perchance to dream; ay, there's the rub:
For in that sleep of death what dreams may come,
When we have shuffled off this mortal coil:"

no; the mind at once pauses, apprehending its own helplessness in unravelling the mighty problem, and the conscience haunted by the dread of "something after death," again causes the idea of suicide to be cast aside.

And yet it might be supposed that Hamlet, a scholar, hankering for death as the easiest means of escaping the grievous troubles which had beset him, would but too readily have sought counsel from the writings of those ancient philosophers who had justified suicide, when either bodily or mental suffering taxed our endurance. The name of the greatest of these, Seneca,—one who like Werther, always held it as a consolation that it was at his will to leave the world when he liked,* and who had represented Deity as teaching us that "if we choose not to fight against evils, we may fly from them: therefore, of all things which he had made necessary for us, he made none so easy as to die,"†—had but a little while before been in the mouth of Polonius when addressing Hamlet.‡ But the latter never attempts thus to pander to his feelings. Whence comes this? It is evident that the belief that suicide was an offence against the laws of God, which had governed Hamlet's thoughts when he first reverted to the subject, also controlled them when he again returns to it. It is this conviction, unexpressed, but which together with that thorough belief in the existence of a heaven and a hell so fully manifested or implied in the ghost scene, the scene where the King is praying, and elsewhere in the play, which curbs Hamlet's philosophical speculations on death and gives them that peculiar character in the great soliloquy, "To be, or not to be," which some commentators have thought to be inconsistent with the scenes referred to. In fact, there is no incidental feature in the delineation of Hamlet of greater interest than the mode in which the doctrines of the Christian Church are shown to hold in

* Ep. lxx.
No. II.

† *De Providentia*.
P

‡ Act ii. sc. 2.

check the propensity to suicide—a feature characteristic of the history of suicide among Christian nations at the time in which the action of the play may be considered as having taken place. It remained for our own time, and for the young German mind first of all in the character of Werther, to show that the truths of Christianity could be pleasingly dovetailed into the pagan doctrines of suicide.

Werther is represented as having recourse to suicide in order to escape the mental misery occasioned by an unrestrained and adulterous passion for the wife of a friend. He has no trouble but what is of his own creation, none but what is dependent upon the deprivation or lack of some sensuous pleasure—refined it may be (as the world goes), but sensuous nevertheless. He hugs these troubles and cherishes them as holy things; but “hemmed in as he is, he [like the ancient Stoics] ever keeps in his heart the sweet feeling of freedom, and that this dungeon *can be left when he likes*.”* He treats suicide as a legitimate thing, morally, and buries the iniquity and folly of the deed beneath a heap of wretched paradoxes. He entertains no other ideas of morality than those which are involved in its conventional practice; he adopts religious beliefs only so far as they may be modified so as to foster his peculiar vices; and having thus modified them, he advances his great and final woe, the uncontrolled and ungratified passion for his friend’s wife, as a crown of martyrdom and a sure ground of beatitude hereafter!

“Everything passes away, but a whole eternity could not extinguish the living flame which was yesterday kindled by your lips, and which now burns within me. She loves me! these arms have encircled her waist, these lips have trembled upon hers. She is mine! Yes, Charlotte, you are mine for ever!

“And what do they mean by saying Albert is your husband? He may be so for this world: in this world it is a sin to woo you—to wish to tear you from his embrace. Yes, it is a crime, and I suffer the punishment; but I have enjoyed the full delight of my sin. I have inhaled a balm that has revived my soul. From this hour you are mine; yes, Charlotte, you are mine! I go before you. I go to my Father, and to your Father. I will pour out my sorrows before Him, and He will give me comfort till you arrive. Then will I fly to meet you. I will claim you, and remain in your eternal embrace in the presence of the Almighty.

“I do not dream, I do not rave. Drawing nearer to the grave, my perceptions become clearer. We shall exist; we shall see each other again; we shall behold your mother; I shall behold her, and expose to her my inmost heart. Your mother—your image!”†

Hamlet and Werther:—is not this another reading of Hyperion

* *Letter*, 22nd May.

† *Werther*, Bohn’s Ed., p. 348.

to a satyr? The one at all times curbed more or less, directly or indirectly, by the broad doctrines of Christian morality and truth, the other deliberately mutilating these doctrines and prostituting them to the service of vice and suicide, decorating the latter also with a wealth of meretricious sentiment; the one recoiling from and seeking to evade the dread task imposed upon him by Revenge for a murdered father, the other playing with the idea of murder as a fitting means of terminating his self-generated troubles. "I will die," writes Werther. "It is not despair, it is conviction that I have filled up the measure of my sufferings, that I have reached the term, and that I sacrifice myself for you. Yes, Charlotte, why should I not say it? It is necessary for one of us three to depart—it shall be Werther. Oh! my dear Charlotte! this heart, governed by rage and fury, has often conceived the horrid idea of murdering your husband—you—myself."* Hamlet and Werther must ever stand wide apart from each other; no just analysis will approximate their characters. It is insufficient to say that there can be detected in Hamlet the germ of that spirit of doubt which besets Werther and his congeners. The doubt of the former is that incidental to one whose soul has been borne down and unbraced by accumulated sorrow, and who, in the bitterness of his heart, would choose death rather than life; the doubt of the latter is the mainspring of his thoughts and actions. The explanation of Hamlet's doubt need not, nor should it, be sought in any system of philosophy or philosophical notions of his presumed time, but in the pages of Spenser,—of whom Shakspeare himself has written:—

"whose deep conceit is such,
As passing all conceit, needs no defence."

Also:—

"And I in deep delight am chiefly drown'd,
Whenas himself to singing he betakes."†

Read how Despair pleads with the Red Cross Knight:—

"Is not short payne well borne, that brings long ease,
And layes the soul to sleep, in quiet grave?
Sleep after toyle, port after stormie seas,
Ease after warre, death after life, does greatly please."

Die shall all flesh? What then must needs be donne?
Is it not better to die willinglie,
Than linger till the glas be all out ronne?
Death is the end of woes: Die soone, O Faerie's sonne."‡

* Letter, 20th Dec.

† *The Passionate Pilgrim*, Sonnet vi. "If music and sweet poetry agree," &c.

‡ *The Faerie Queene*, Bk. i. c. 9.

But when Hamlet uttered his doubts there was no Unassisting by to withdraw him from the counsels of the tempter. Once before she had saved him; but now Revenge had usurped her place, and such reasons as he could urge for life served to add, not detract, from the desire for death. What, then, was left which could hold Hamlet back from suicide, but the dread of an hereafter?—in him the faint and murky, but still unextinguished reflection of that Christian element which comes to the surface throughout the play. The doubting of Hamlet is that to which all men have been liable, and to which many have yielded, in all ages of the world, when exposed to excess of mental or bodily suffering: the doubting of Werther is that which is peculiar to an extravagant philosophical scepticism, whether ancient or modern. The one is the result of the mind succumbing to a stress of grief; the other is the product of a self-satisfied and self-confident system of reasoning.

Again, it is insufficient to say that in Hamlet we have the prototype of those characters in whom action is enfeebled by exaggerated, undue mental activity. "In Hamlet we see," writes Coleridge, "an enormous intellectual activity, and a proportionate aversion to real action consequent upon it, with all its symptoms and accompanying qualities. This character Shakspeare places in circumstances under which it is obliged to act on the spur of the moment. Hamlet is brave, and careless of death; but he vacillates from sensibility and procrastinates from thought, and loses the power of action in the energy of resolve."* "The preponderance of thought and speech over action," writes Du Boismonet, "in a word, feebleness, is the foundation of the fanciful and melancholy heroes of suicide."† But even were we to admit the correctness of these abstract views, it does not in any degree help us to reconcile the concrete characters of Hamlet and the Werther school, or to trace the development of the latter, even remotely, to the influence of the former. No parallelism exists whatever, either in the causes leading to the development, or in the mode of growth, or in the results of the disgust of life which is portrayed in the mediæval (assumed) hero and our modern heroes of suicide. In the latter we behold, as Goethe tells us he desired to set forth in the character of Werther, "that disgust which man, without being driven to necessity, feels for life."‡ "We have here," he again says, "to do with those whose life is embittered by a want of action, in the midst of the most peaceful circumstances in the world, through exaggerated demands upon themselves."§ In short, Hamlet belongs to all time, Werther to a peculiar epoch, and there is no greater resemblance between the

* *Literary Remains*, Vol. iv. p. 205.

† *Du Suicide*, p. 174.

‡ *Autobiography*, Bohn, Vol. i. p. 502.

§ *Op. cit.*, Vol. i. p. 50.

two characters than that which exists (to take a simile from Bunyan's character of Self-Will, who represents in no small degree the religious phase of Wertherism) between a child that has been cast down by a blast of wind or tripped up by a stone, and defiled itself in the mire, and one who has wilfully laid down and wallowed like a boar therein.

Neither in Shakspeare, nor in the older poetical literature of England as a whole, nor, indeed, in the entire literature of this country prior to the publication of *Werther*, can be found the special characteristics of the modern æsthetical literature of suicide. Truly we had, when that book first appeared, our apologists for suicide. Suicide was also then notoriously very common among us, and the philosophical scepticism which at that time pervaded France and Germany, and which frittered away all that was vital in religion and morality, prevailed extensively in England.

Europe, indeed, at the period we are writing of, was profoundly disquieted. The influence of religion and morals over men's minds, and the authority of the Church, had been waning throughout the century, and towards its termination had become greatly enfeebled. Philosophy, in the absence of religion the chief refuge for those higher cravings of the mind which lie at the source of our moral and social habits, was herself luxuriating, and too commonly running riot in the liberty she had just fully secured from the trammels of theological dogmas and traditions. Tainted, moreover, by the prevalent unbelief, she lent herself to support and confirm it. The sensualism of Locke, then the reigning system of philosophy, had been pushed to its most extravagant lengths in fatalism, materialism, and atheism, and thus became the chief feeder of that popular scepticism under which a declension in religion or morality at all times seeks to cloak itself. Such a scepticism was the great mental characteristic of the period, and it pervaded all classes of the people. If, however, the predominant sensualistic philosophy of the time formed its main aliment, yet it also fed, in Germany at least, upon the idealism that came in its way, deducing from that system a pure pantheism—a deduction which in every way served its purpose.

Whatever had served to lend a charm to life in literature, in art, and in social life, suffered to a greater or less extent from the blighting influence of this scepticism, itself at one and the same time a result and a fostering cause of irreligion and immorality. The bonds which held society together were relaxed, and in France they, in the end, were rent asunder with such terrible vehemence, that every nation in Europe trembled to the very centre with the shock.

The evil passions of man, so largely unrestrained except by the ignoble motives of brute force and selfishness, rushed freely

to the surface, and suicide (not the least among the ills which then obtained an undue prominence) was elevated to a dignity which it had probably never before possessed among Christian nations. But even suicide itself, an act which it might have been supposed admitted of no variation in degree of infamy, became more degraded than it had ever before been. Among the ancient pagan apologists and justifiers of the deed, suicide, as a rule, was only vindicated when it was had recourse to from patriotic motives, or to escape dishonour, or unmerited or involuntary suffering, the individual having previously lived a virtuous life; while he who had committed the act, to escape from the consequences of his own evil deeds or vicious habits, was branded with ignominy. At the epoch of which we are now writing, however, notwithstanding that the virtues of the ancients were aped, these were too generally made to shield the vices of the moderns. Suicide was justified without reference to the causes of the deed, the gambler and the debauchee, as well as he who had been hounded to despair by misery of his own begetting, slipping out of the world at their convenience, and flattering themselves that they were emulating in so doing an ancient virtue.

Thus it came to pass that at the termination of the eighteenth century men's minds were deeply disturbed, and a quasi-philosophical scepticism, which, in whatever manner it might humour the reason left the feelings sterile, had usurped the place of religion.

In England, about the middle of the eighteenth century, "free-thinking" had received a fresh impetus from the publication of Lord Bolingbroke's posthumous works; and from the strictures of contemporary writers upon the prevalence of suicide at that time, we learn that this act was then attributed mainly to wilful extravagance and debauchery on the one hand, and to scepticism on the other.

"Another principal cause of this frequency of suicide," says a writer in the *Connoisseur*,* "is the noble spirit of free-thinking which has diffused itself among all ranks of people. The libertine of fashion has too refined a taste to trouble himself at all about a soul or an hereafter; but the vulgar infidel is at wonderful pains to get rid of the Bible, and labours to persuade himself out of his religion. For this purpose he attends constantly at the disputant societies, where he hears a great deal about free-will, free-agency, and predestination, till at length he is convinced that he is at liberty to do as he pleases, lays his misfortunes to the charge of Providence, and comforts himself that he was inevitably destined to be tied up in his own garters."

The same writer satirically suggests that "if this madness (of suicide) should grow more and more epidemical," it would "be expedient to have a bill of suicide, distinct from the common bill

* No. 50, Jan. 9, 1755.

of mortality, brought in yearly: in which should be set down the number of suicides, their method of destroying themselves, and the likely causes of so doing." He believes that few would be found martyrs to the weather, and he adds the following significant sketch of a bill:—

"A Bill of Suicide for the year —

Of Newmarket Races,—	Of Lord Bolingbrooke, &c.,
Of kept Mistresses,—	&c.,—
Of Electioneering,—	Of the Robin Hood Society,—
Of Lotteries,—	Of an Equipage,—
Of Gambling,—	Of a Dog-Kennel,—
Of French Wines, French Cooks,	Of Covent-Garden,—
&c., &c.,—	Of Plays, Operas, Concerts,
Of Chinese Temples,—	Masquerades, Routs, Drums,
Of a Country Seat,—	&c.,—
Of a Town House,—	Of keeping the best Com-
Of Fortune Hunting,—	pany."*
Of a Tour through France and	
Italy,—	

From this period the progress of popular scepticism in England followed pretty much the same course as that of France and Germany, and with very similar results, intellectually and morally. About the termination of the century we find, also, the prevalence of suicide assigned to the existence of "melancholy" among us, the term being evidently used to convey the notion of that emotional state which Goethe endeavoured to depict in the character of Werther. A writer in the *Looker-On*† discusses, in two very interesting essays, the question of melancholy in connexion with suicide. He describes melancholy as being "among those modifications of the human character, which wait the fecundating efficacy of social refinement, ere they break out in all their diversities of shade and colouring." He asks, "how it should come to pass that an addiction to melancholy is more common among my countrymen than other Europeans." This, he conceives, is to be sought in moral, not in physical causes:

"Blame not thy clime, nor chide the distant sun;
The sun is innocent, thy clime absolved:
Immoral climes kind nature never made."‡

"If, therefore," he writes, "in our search after the grounds of this melancholy, we look no farther than the mind it inhabits, what abundant sources of secret sorrow, what a laboratory of pains and afflictions, do we there discover! In the cruel fondness of parentage, in the early plantation of deceitful hopes, and not seldom of vicious

* See also, for bitter satires on the subject of suicide, *The World*, No. 193, Sept., 1756; and the *Gentleman's Magazine*, Vol. xxv. p. 43, 1755. The article last referred to has been ascribed to Dr. Johnson.

† Nos. 85 and 86, 1794.

‡ Young's *Night Thoughts*, Night v.

principles ; in the selfish luxury which is permitted to youth, and in the barren occupations to which our manhood is surrendered ; in the unripe consequence with which children are invested ; and in the fastidious satiety which, in our present forcing system of culture, teaches us to spurn at simple pleasures, before even half our capacities of delight are unfolded—I read the long history of human sorrows, and see the whole mischief developed in its series of causes and effects.”

The essayist next considers the influence of political freedom, and remarks :—

“I hope it may be the timorous observations of an old man, for it is, indeed, a dispiriting consideration, that as we gradually mount from slavery to freedom, as we gradually draw towards the state of society most honourable to our natures, and most favourable to our natural search after knowledge and improvement, the melancholy of our mind increases and new shapes of inward sorrow are tacitly blended with our triumphs.”

In another paragraph, we read :—

“But of all the sorrows whence arise that melancholy which ripens with our age, there are none so prolific as the neglect, in those on whom youth depends, of placing before them such objects and amusements as are durable, and last beyond the date of short-lived juvenility” . . . [not, however, overlooking the natural sportiveness of children].

In his observations on suicide the essayist says :—

“I am persuaded there never has existed a man brought up by his sorrows to the act of suicide, in whose history, could we get the truth concerning him, we should not . . . find a gross principle of vanity at the bottom, a tissue of proud assumptions and expectations, and those for the greater part the result of parental indulgence and the deceitful promises of early adulation.”

Clearly this writer is dealing with a crude Wertherism, and the tone of the two essays to which we have referred, throughout shows that the author, although probably unwittingly, was tainted by the peculiar disgust of the time in which he wrote, and that the “melancholy” of which he sought to investigate the causes, was of that particular form out of which Wertherism arose.

It was with this melancholy or disgust of life, a product of that mental and moral state of society which we have attempted briefly to sketch, and which existed more or less in this country and among the Christian nations of Europe, that Werther chimed in when given to the world, and which then, for the first time, received a full and definite expression. But this was not the sole, or even the chief secret of the amazing influence exercised by the book, and of the avidity with which it was everywhere seized upon. Hitherto, that vague, dreamy, objectless dis-

quietude and depression of mind, of which Werther subsequently became the type, had in no respect been more repulsive than in their seemingly utter dissociation from all the better feelings of humanity: these had hopelessly withered away beneath their blighting influence. But the genius of Goethe effected a magical transformation. If, on the one hand, he had truly given voice to the wailings of the restless and melancholy spirits of the epoch, on the other, he had clothed all that was revolting, all that was contemptible, all that was barren and worthless of their peculiarities, in a delicate and finely-wrought veil of æstheticism, which gave to the character of Werther an aspect of being linked to the holier feelings of our nature, by many and most powerful bonds. He, in fact, infused a seeming vitality of true feeling into the sterile tracts of sceptical philosophy and morality (or rather immorality), and those who were wearily traversing or were lost in the arid desert, hailed with rapture the delusive mirage. "Werter," Carlyle writes, "appeared to seize the hearts of men in all quarters of the world, and to utter for them the word they had long been waiting to hear. As usually happens, too, this same word once uttered, was soon abundantly repeated; spoken in all dialects, and chanted through all notes of the gamut, till the sound of it had grown a weariness rather than a pleasure. Sceptical sentimentality, view-hunting, love, friendship, suicide, and desperation, became the staple of literary ware; and though the epidemic, after a long course of years, subsided in Germany, it re-appeared with various modifications in other countries, and everywhere abundant traces of its good and bad effects can still be discerned."*

If, as we have contended, the peculiarities of Werther cannot in any degree be traced to the literature of this country, and that that work was the first manifestation, and, in so far, the origin of the modern æsthetical literature of suicide, it cannot be denied that among us arose the most powerful of the race of sentimentalists, of whom Werther was the forerunner. Of these Byron was undoubtedly the greatest;† but notwithstanding this, Wer-

* *Op. cit.*, Art. Goethe.

† "— Nous n'hésitons pas à donner à Byron la supériorité sur Goethe, comme poète *caractéristique* de l'époque; car nous trouvons dans Byron, pour employer une expression même de ce poète, *une plus grande vitalité du poison*."

There is a very life in our despair,
Vitality of poison; a quick root
 Which feeds these deadly branches.— *C. Harold*.

"Byron, par la nature particulière de son génie, par l'influence immense qu'il a exercée, par la franchise avec laquelle il a accepté ce rôle de doute et d'ironie, d'enthousiasme et de spleen, d'espoir sans bornes et de désolation, réservé à la poésie de notre temps, méritera peut-être de la postérité de donner son nom à cette période de l'art: en tout cas, ses contemporains ont déjà commencé à lui rendre cet hommage."—Pierre Leroux: Introduction to *Werther*, pp. xix, xx.

therism proper (that is to say, the type being closely copied) was comparatively short-lived in England, and at the present day, perhaps, it is only to be found in France, where it still flourishes with considerable vigour.

It is a question of considerable interest whether there is any probability of a recrudescence, in this country, of that æstheticism of suicide which is one of the chief features of Wertherism. There is happily little in common between the moral and intellectual characteristics of the present day, and those of the period of which we have been writing. It is certain, however, that there is never wanting a haven of that peculiar form of scepticism, which, as we have seen, constituted by far the most important of the intellectual elements which were efficient in the genesis and propagation of Wertherism. Two things in connexion with this subject are especially worthy of note in our own day; first, the wide-spread interest which has been excited by Mr. Buckle's fatalistic doctrines, as set forth in the introduction to his *History of Civilization in England*, and which are illustrated mainly by the statistical records of suicide and murder; and secondly, the fact that suicide is beginning to fare well at the hands of our artists.

Mr. Buckle asserts, concerning suicide, that all the evidence we possess points "to one great conclusion, and can leave no doubt on our minds that suicide is merely the product of the general condition of society, and that the individual felon only carries into effect what is a necessary consequence of preceding circumstances."*. We read in the *Bhagavad-Ghita*, that—"The presumptuous thinks himself the author of his actions; but all his actions come from the force and from the necessary concatenation of things." This dogma, Cousin tells us, is "destructive of all liberty and all morality,"† yet Mr. Buckle's opinions are but a modern development of it.

Again: in the Royal Academy Exhibition of 1859, a painting hung upon the walls, simply described as *The Fumes of Charcoal*, and in which suicide was treated purely æsthetically.‡ In this painting two young persons, a male and a female, are represented committing suicide, by inhaling the fumes from burning charcoal. As the subject is dealt with, the artist would appear to have no other object than that of veneering the act of suicide with a perverted sentimentality. In the Exhibition of last year, conspicuously placed, was Mr. Solomon's large and powerful painting, in

* Vol. i. p. 25, 2nd Ed. For an examination of Mr. Buckle's evidence for this conclusion, and a proof of its insufficiency, see *Journal of Psychological Medicine*, Vol. xiv. p. 590.

† *Cours de l'Histoire de la Philosophie Moderne*. Par Victor Cousin. 6me Leçon.
‡ This painting is at present hanging in the picture gallery of the Crystal Palace, Sydenham.

which suicide is treated melo-dramatically. The time is daybreak ; a golden-haired girl has just been fished out of the Thames, near one of the bridges, and brought to the head of the stairs by two watermen ; the body is held in the arms of a motherly-looking flower-woman, and the face of the unfortunate is illuminated by the bull's-eye lantern of a kneeling policeman, a girl with a basket of early wild-flowers on the head standing by and looking pityingly on. A body of wild revellers in masquerade-costumes, crossing the bridge, come suddenly upon the sad group, and from the startled and horrified face of the first reveller, a gentleman, who has a brilliant and laughing Traviata hanging upon his arm, we learn the history and source of the suicide's fall.

Without ascribing undue weight to these indications of suicide becoming, or seeming as if it were about to become, a favourite subject with our artists, or to the fact of certain fatalistic doctrines, of which suicide is advanced as one of the principal illustrations and proofs, being received with avidity by the reading public, it is well to ask to what such things might tend. The answer to this question is best derived, first, from a history of the modern æstheticism of suicide, which we have endeavoured to sketch in this article ; and secondly, from an examination of the latest manifestation of this æstheticism, as exhibited in recent French literature. This we propose to deal with hereafter. In conclusion we would repeat certain remarks that we have already made use of in reference to this subject in the past series of this *Journal* :—

“— Wherever Mr. Buckle's reasoning finds acceptance, it may be anticipated that it will lead to an unfortunate indifference to suicide in its social relations. Meriting neither praise nor blame, and uninfluenced by moral restraints, the act must be submitted to as a disagreeable necessity of every-day life, and we must accustom ourselves to it in the best way we can. And how will this be brought about ? Shall we rest content to have this revolting creation of a new Frankenstein hunting its victims day by day to death among us in commonplace ghastly guise ? Surely not. We shall strive to hide the most horrible features beneath a profusion of conceits ; we shall fence in the pathways of the demon with a wealth of fanciful sentiment, and, it may be, we shall end as many others have done by enthroning an image of him, and worshipping it. . . . Let us have a care. We have our present artists who find a charm in suicide ; we have an apologist for the act in certainly one of the most facile and attractive historical writers of the day ; and the prescriptions of both the law and the gospel in reference to it are in a great measure unheeded. This is not a bad starting-point and groundwork in favour of a reactionary movement, sympathetic of suicide, and if we do not take heed, we shall have our young men and

maidens looking upon the deed as a matter of feeling, and not of morality. And so, in due time, we should come to hear the legitimacy of suicide babbled of at our fire-sides and in our workshops, while sympathy would find an outlet in song."*

ART. III.—PROFESSIONAL TRICKSTERS.

CAN it be possible that the honoured and honourable diploma or license in physic, should ever become a stalking-horse for trickery? Is it reasonable to suppose that the doctor would at any time be influenced by the petty sentiments of spite and envy, in his conduct towards his professional brethren? As a philosopher, or at least as a man of common sense, (a less pretentious, but by no means less creditable character,) it might be imagined that he was too intimately acquainted with the chances of life ever to think it worth while to feel anything but the deepest interest in their honour and welfare. Rightly appreciated, the success of another adds lustre to ourselves. The distinguished conduct of each conduces to the distinction of all, just as the prosperity of all contributes to the well-being of each. In this light there would be no place for envy, and the noblest of professions, standing among the first in science as it is the first in benevolence, disinterestedness, and fraternal kindness, would not be sullied by those bickerings and heartburnings which too commonly beset the course of everyday life. But, alas for human nature!

In yonder row of spacious mansions resides, no matter whence his wealth, a very rich man, who has purchased two of the houses and thrown them both into one. He is so rich that he consumes upon himself alone more than twice as much as any other ordinary human being, and, singular to say, enjoys better health than most mortals. His grooms, his horses, his furniture, and his household, all bespeak the man of money. He is a rare child of fortune, and fortune is good so long as she lasts. But what of that? He is sometimes ailing, and in the hour of need, real or imaginary, resorts to the aid of medical skill. What a pluming of pinions among the rising M.D.'s; what a shuffling of feathers among the eager general practitioners! What tiptoe excitement to learn upon whom will fall the patronage of one who is as much beneath them in intelligence as he is above them in wealth! Of course, only one can be selected. The rest bite their lips and retire. The great man takes a dislike to the one he has chosen. He turns him off and calls in a second, who is in turn dismissed as

* *Journal of Psychological Medicine*, Vol. xii. p. 601.

summarily as the first. Both the first and the second were men of approved talents and probity ; but the great man does not care for that ; they did not suit him, and he puts them aside at a moment's notice. He at last falls in with one to his entire satisfaction, in the person of an ignoramus as clever as himself. It is a decided hit ; they were made for each other ; and Dives and Ignoramus go hand in hand. The squad of the rejected look on and wonder, but it is a wonder to no one except themselves.

In that well-furnished nursery lies a sick child, tended by its officious nurse, and watched by its sensitive mamma with continued and restless solicitude. The care bestowed upon the infant is out of all proportion to the exigency of the case. The child is ill and may possibly die, but will, under ordinary care and attention, in all probability recover. The medical man who has charge of the case is a well-informed and experienced practitioner, perfectly aware of the contingencies of the ailment, and calmly alive to the whims and fancies by which he is beset. His little patient lingers on ; his credit is on the wane ; another practitioner is named of infallible skill, particularly in cases of this description ; and he is called into consultation along with the family medical attendant. At the appointed hour, a carriage and pair drive up to the house ; no knocker is raised, for fear of a noise ; only the door-bell vibrates gently ; and in walks the pattern M.D. He is a tall man with an obsequious stoop, and his knees slightly bent. His hair is brushed back ; he wears gold spectacles, a white tie, and a black suit. There is no creaking of his shoes, and his manner is bland and soothing. He hangs over the crib of the dear sick child in a solemn attitude of observation ; touches it lightly, listens to its breathing, feels its tiny pulse at the wrist ; and then quietly looking up asks the old practitioner, who is standing by and looking on, whether he has given his little patient *Tous les mois*,—a panacea at that time only just introduced. The answer is in the negative. What?—Not!—replies the pattern, with an affected look of surprise ; not given *Tous les mois*? *Tous les mois*, nurse ; *Tous les mois*, my lady,—turning to the agonized mamma—*Tous les mois* will cure your child ! The old practitioner is dismissed, on the score of ignorance, and under the judicious use of *Tous les mois* the child recovers.

There are tricks in every trade, but of all tricks, professional pedantry is the most detestable. It has it all its own way. The party duped can have no insight into the secrets by which he is guided in the management of his property, his soul, or his life. He must trust implicitly to the integrity and skill of his professional adviser, whom he flies to in moments of the last resort. It is in the embarrassment of such occasions that the trickster succeeds. There is the opportunity of putting himself forward, and he seizes it with adroit avidity.

The *monstror digito prætereuntium* * is a vanity common to all sorts of professional persons—the painter, the musician, the poet, the medical man, and artists of every description. It is gratifying to have ourselves pointed out as we pass along, and to hear it said—that is he: *pulchrum est digito monstrari et dicier* *Hic est*, as Tacitus says, speaking of the orators.† It is a venerable folly, sustained by classical authority, countenanced by Cicero, and quizzed by Horace.‡ A slave nudged the aspirant for public favour in the side (*fodiat latus*), and whispered in his ear the name and title of those who met or passed him in the way. It is the same now as it was then. The rising medical man does not indeed retain a nomenclator at his elbow, but he does what is equally as effective, for he publishes a book to make himself known, and he rides in a carriage to let himself be seen. The world will not step out of its way to look after you. If you are not known, you may as well be lost or dead. Unadvertised, you go for nothing. You must proclaim your own merits, and put forward your own pretensions, with the best grace you may, or else make up your mind to subsist on modesty, truth, and small means for the rest of your days.

The competition which such a line of conduct necessarily provokes, engenders the heartburnings and petty rivalries that ruffle the social surface of the medical world. It is the old story—there cannot be two Cæsars in the same camp, nor two Kings of Brentford in the same village—*omnis potestas impatiens consortis*, and in the medical profession this is particularly the case. There can be no partnership in medicine, for it turns upon personal merit; if one succeeds the other fails, and the one that fails envies or hates his successful rival. Consequently, unless the mind and temper be extremely well regulated, the egotism and self-sufficiency of the medical character are almost proverbial. Who ever supposes that doctors were framed for the love of one another? No one, unless he be a simpleton or a novice. Men of the world suppose no such thing. They take it for granted that two of a trade never agree. Hence it is, that, though unfounded in fact or reason, medicine holds so low a place in their esteem. Without giving themselves the trouble of examining the essential difference between charlatanism and science, they *lump* the whole together, and regard it all as a mystery or pretence, which they must use as well as they can, whenever the hour for having recourse to it is forced upon them: Were it not for this adverse impression, medicine would long ago have gained the ear and secured the attention of Government, upon the ground of its being a practical science of the highest national importance.§

* *Hor. Od. iv. 3.*

† *Tacit. Dial. de Oratt. 7; Persius, i. 28.*

‡ *Cicero ad Att. iv. 1. Cicero pro Muræna. Hor. Epist. i. 6.*

§ Two thousand years ago, men of the world thought the same:—"Medicus enim nihil aliud est, quam animi consolatio . . . medicus, qui scit, quid homines

People are misled by appearances. That general practitioner you see driving along in his open barouche was educated at a small preparatory school, served his time in an apothecary's shop, passed his examinations, and is now playing the fine gentleman. He never attends a servant, nor any inferior person, *i.e.*, an unpaying patient, except as an act of grace. No one could be more timid than he was on his first commencing practice. A child might have whipped him with a straw. At this critical juncture he besought the aid of one much older, if not wiser, than himself, and in him found a friend who fulfilled indeed the adage of being a friend in need. Night and day he beset his friend's door, which was always open to his call, and there he found, what he required, help in his necessities, consolation for his alarms, and the assurance of his final success. The hour of success arrived as it had been predicted; but no sooner had it arrived than he kicked the ladder that had helped him up from under his feet, mounted the platform, as it were, by his own unaided efforts, and stood alone. Now he lords it among the best of his fellows. Only a few are good enough to be countenanced as his equals. His manners and deportment are supercilious and overbearing. He takes the upper hand with his brethren, except those to whom he thinks proper to bow, to cringe, or to court. Colbert, in the reign of Louis XIV., did the same,* and so did Sir Andrew McSycophant, in the *Man of the World*. It is by no means a bad game, although it sometimes fails egregiously. As to his absolute knowledge and acquirements, they are as shallow as shallow can be, but perfectly suitable to that class of delicate cases in which the married and unmarried, in brocade and finery, are supposed to rule supreme. His behaviour is what is emphatically styled *sugary*, and he is a lady's man in every sense of the word.

The puppets that strut upon the stage of the world are as numerous and amusing in medicine as they are in any other profession, trade, or calling. Perhaps more so, because the practice of physic ministers directly to the self love and egotism of its votaries. None but his admirers and friends seek the popular practitioner; he never knows his enemies, who never consult him. He moves in a charmed circle, within the sphere of which he meets with nothing but adulation, and beyond which he never steps. He is a pet in the fullest meaning of the word. His

intra præcordia habeant, et quid febris veniat . . . illos odi pessime.—*Petronius*. "Turba medicorum Cæsarem perdidit, were the last words of the Emperor Hadrian. The Roman physicians were Greek slaves, or freedmen upon whom Cæsar bestowed the right of citizens."—*Suetonius*.

* "Colbert était le petit-fils d'un marchand de draps. Il eut la faiblesse de rougir de cette obscurité," &c. It is said that he never bowed to any one less than a prince of the blood royal, except his grand patron Mazarin.—*VOLTAIRE*, *Louis XIV.*

little world cannot live without him, till it has changed its mind, and then he must learn to live without it.

The stage upon which he struts has its loose boards, which sometimes slip from beneath his feet before he is aware of it. It is his ignorance of the jeopardy in which he is placed that makes him forget himself and pretend to be something great. He cannot see, nor does he know, that, so long as his career lasts he is nothing better than an actor dressed up for the hour, to suit the nonce. He calls down the plaudits of the house whenever he appears on the boards. But let him quit the scene, and walk the streets by daylight as a private man, and he will find that no one knows him in his plain clothes. The applause which made him giddy was due to his office, not to himself. The next that treads in his steps will succeed as ably as he has done, and fail or fall as quickly as himself. Professional friendship is the expression of public confidence. As such it is invaluable, since it is, in fact, only another term for character and reputation; but overrate it, and you will find to your cost that, like the ass in the fable, you have made a false step by leaping into your master's lap.

There is a ripe season in every one's life which soon comes to a close. The summer solstice is brief. The best man has his day. The best actor may linger too long upon the stage. The *vivas* of yesterday will be re-echoed by the *à bas* of to-morrow.

The same shield has its two sides, the golden and the leaden one. We have been looking at the lead; now let us see the gold. In an age, which was none of the brightest, Charles II. did not hesitate to reward the author of the *Religio Medici*, and the good and quaint Sir Thomas Browne still adorns the list and library of the Royal College of Physicians. The writings of Sydenham are the best comments on himself, and his worth has obtained for him the inestimable title of the Father of English Medicine. The evening of life closed in upon Boerhaave, and found him in the vale of years still studious and religious, endeavouring to dispense for the maladies of others that relief which he had failed to procure for himself. It is superfluous to expatiate on the virtues of these great men. They are known to all the world. But if there were giants in those days, the men of modern date are not pigmies. The names of Babington, Bailey, Cooper, and Abernethy are as household words upon our lips; and their successors, Brodie, Bright, Watson, Copland, Todd, and others, whom it would be as invidious to omit as to mention, deserve no less a meed of praise. Their career is graceful and attractive, because it is their own. They are what they are, and no change of fortune could dwarf their just proportions. Medicine owes them everything. Good sense and good taste, sound learning and practical skill, modesty and worth, are qualities which compel universal respect, defy criticism, and outlast time.

Dignum laude virum Musa vetat mori.

ART. IV.—QUARANTINE AND THE SPREAD OF EPIDEMIC DISEASES.

By GAVIN MILROY, M.D., F.R.C.P.

AMONG the means employed in most countries to preserve the public health and to ward off the visitations of pestilential diseases, is that of enforced detention and purification of infected or suspected ships, persons, and goods, before their direct communication with the shore or their passing the frontier is allowed, known as Quarantine. Under this term is also included the practice of isolating a place where a pestilence already exists, by drawing a cordon of troops around it, so as forcibly to cut off all intercourse between it and the surrounding district, in the hope of confining the mischief to the infected spot, and thus stopping its extension.

As thus understood, and as it is generally practised, quarantine can scarcely be regarded as a part of true sanitary or preventive medicine, the high aim and object of which is to prevent the rise and growth of disease by removing the causes which foster their development and give malignancy to their action. It is rather a department of State police, which endeavours, by a sort of mechanical machinery, to keep out the introduction *ab extra* of a dreaded distemper, very much after the same fashion as the Custom-house authorities endeavour to prevent the importation of interdicted foreign goods, or the landing of strangers who have not duly-authorized passports.

Hitherto, with only few and occasional exceptions, the subject has not received from medical men, and others competent to judge, that amount of attention which its great importance, not only in a social and international, as well as a commercial point of view, but also as a question which involves the consideration of some of the most interesting problems of epidemiological research, certainly demands. It would be difficult, indeed, to name any branch of scientific inquiry on which so many frivolous, and even fabulous statements have been received as evidence, and so much loose and inconsequential reasoning has prevailed. The result has been what might be expected—quarantine has ceased to be regarded by men of enlightenment as a safeguard of the public health, and too generally it has become degraded into a mere instrument of mercenary exaction, or perverted to one of vexatious Government interference with the freedom of international intercourse.

That it has failed, and continues to fail, in effecting the

object for which it was established, is patent to all. The countries where it is most systematically and stringently exercised are certainly not more free than others from pestilential visitations, and some of them—Portugal and Naples, for example—have suffered more frequently and severely of late years from destructive epidemics than Holland and our own country, where the ordinary restrictions of quarantine are comparatively in abeyance. So notorious, indeed, has been the inefficacy of the system, that some able medical men have recommended its entire abolition, and the discontinuance of all endeavours of the sort, as vain and useless, to keep out any form of disease. It seems wiser, however, rather to seek to reform and remodel a machinery that is capable of being rendered publicly useful, than to do away with it altogether because it has been defective and has been abused.

A rational quarantine should obviously be based upon a knowledge of the ascertained laws which affect and regulate the rise and spread of those diseases which it seeks to exclude, and its regulations and restrictions should as obviously be in consonance with the results of past experience of the measures hitherto employed. The diseases against the importation of which quarantine is, in the present day, mainly directed are plague, cholera, and yellow fever; and it is to them chiefly that the following remarks are meant to apply :—

I. Although we are ignorant of the causes which determine the irregularly periodic outbursts of these diseases in an epidemic or pestilential form, and why they manifest themselves in one year and season, and in one district, island, or country, and not in another under apparently the same condition and circumstances, repeated observation has now satisfactorily demonstrated that they invariably spring up in low-lying damp localities, abounding with vegetable and animal refuse—such as river-banks and deltas, swampy shores or filthy harbours, and where the atmosphere is therefore charged with organic impurities. There appears to be no exception to this law, nor to the like and cognate law that the first cases of the distemper invariably occur in the foul and squalid abodes of the poor. Aerial impurity seems therefore to be as necessary an element or factor in the development of the morbid poison, or germ, as the presence of damp or decaying organic matter is in the development of ordinary mould or mucor. Certain it is that the “*materies morbi*,” as medical writers term it, or the material something which when received into the living body occasions the train of symptoms or phenomena known as plague, or yellow fever, or cholera, ceases to exist, or at least is rendered impotent, in an atmosphere that is kept perfectly pure. The easy means of disinfection are thus always at hand. Even in the height of an epidemic, and in the very midst of an infected

district, the neutralizing power of constantly renewed fresh air has often been signally conspicuous, the inmates of clean well-ventilated buildings remaining unscathed while deadly sickness has been raging around.

No fact is better established, and none is more fruitful of important practical instruction, than the fact of the indispensable co-operation of an impure and vitiated atmosphere to the full force and malignancy of all pestilential diseases.

II. An epidemic invasion is not, as is very generally imagined, a sudden or unheralded event. It is usually preceded by various signs or phenomena which the careful observer will seldom, if ever, fail to discover. The meteorological conditions are often irregular and distempered. There is a greater amount of sickness of different kinds than usual, and the diseases exhibit anomalous and peculiar characters. Generally, however, the prevailing sickness is only a milder and less developed form of the approaching pestilence. Thus, the cholera is usually preceded by epidemic diarrhoea of a choleraic type, or "cholerine," as it has been called by foreign writers; yellow fever by irregular and unusually severe forms of endemic malarial fever, often associated with troublesome bowel disorders—and plague is universally ushered in by typhus fever, which so gradually lapses into the more malignant and dreaded pestilence that it becomes impossible to determine with accuracy when the earliest developed case of the latter took place.

It has been observed that a stranger arriving in a locality where this precursory state of things exist is more liable to sicken than the residents themselves, and that the attack in such circumstances very generally proves fatal, the disease manifesting its malignant type. If this be the first, or one of the first, fatal cases of the epidemic, a suspicion not unnaturally arises in the public mind that the pestilence has been introduced from without, and the suspicion soon gains force, and is readily believed, because every community and country will strive to repudiate the paternity of the evil as a reproach and disgrace, and will seek to father it upon others. The extreme susceptibility of new comers into an infected locality to be attacked by epidemic disease is a fact suggestive of important practical applications in military as well as in civil life.

III. All evidence seems to show that the spread of epidemics is mainly through atmospheric agency, although other and more partial agencies may aid in their dissemination. The diffusion by the atmosphere takes place in a twofold manner. Pestilences are often migratory upon a great scale, travelling on from the country where they sprang up to other and distant countries, and this, too, by successive, although irregular, marches, very much

after the similitude of the progression of insect swarms from one region or continent to another.

In former times, the plague, as the "Black Death," steadily advanced from the confines of China—as epidemics of influenza have been known to do in more recent times—across Thibet and Persia to Southern Russia, and thence extended itself over almost every country in Europe. In our own days, the cholera from the delta of the Ganges has been seen to follow nearly the same track, and with like desolation in its course; and within the last few years, the yellow-fever pestilence has exhibited a diffusive energy unknown before, extending in the New World its ravages from the 30th parallel or so of southern latitude to the 40th degree of north latitude, and from the seaboard of Brazil to that of Chili and Panama.

These great migratory movements must be due to an impelling atmospheric power which eludes our knowledge. Is it, however, unreasonable to suppose that, if accurate registers were kept of the exact dates of the development of the disease in different countries, and of other meteorological phenomena at the same time, some connexion might one day be traced between them, and some approach be made to the discovery of a "Law of Epidemics," as there has been of recent years to the discovery of a "Law of Storms?" But all is mystery at present.

When the epidemic poison has reached a district, its mode of diffusion appears generally to be by a larger or smaller number of nearly simultaneous, or quickly successive, scattered spots of infection, or, as it were, of fermentative action; these spots being irregularly detached and separate from each other at first, but gradually enlarging and extending by the development of new and more numerous spots, until at length they may coalesce, and the atmosphere of the entire district is the scene of morbid activity. The very accurate investigation which was instituted by the General Board of Health of all the early cases of the cholera when the pestilence visited London in the autumn of 1848, fairly leads to such an explanation of its mode of spreading in the metropolis; and the table of the dates of its appearance in different parts of England and Wales during 1848 and 1849, given in the Registrar-General's valuable Report on the epidemic, seems to point to the like conclusion.

Besides these modes of general diffusion through the medium of atmospheric agency, a pestilential disease possesses the property of increase and multiplication in the bodies of the sick, and of being, under certain conditions, communicable from the sick to healthy persons around them;—these latter becoming, it may be, under similar circumstances and conditions, the instruments of a wider propagation.

This property is generally known by the term "Contagion,"—a term of very loose and ill-defined import, being indiscriminately applied to the mode of spreading of the itch and of scald head on the one hand, and of the cholera or the plague on the other.

There has been much and vehement controversy among medical writers as to the part which contagion plays in the extension of most pestilential diseases, and as the most extreme opposite opinions have generally been formed and insisted upon by the disputants, the cause of Truth has, as is usual in such cases, but little advanced. To deny unqualifiedly their communicability, and to assert without reserve that they are never contagious, has only exposed the advocates of the doctrine to easy confutation by their opponents, who, on the other hand, have usually adopted the extravagant notion that because under some conditions and in some instances, a disease has manifested a power of transmission from one person to another, not only must it universally and invariably do so, but also that it is in this way alone that it can diffuse and extend itself.

It would be about as reasonable for any one to maintain, that, because trees may be multiplied by slips or cuttings planted in the ground, their propagation is never effected by their seeds being wafted from place to place.

The really important question is to determine the circumstances or conditions in which a disease is apt to manifest a contagious property, and to determine the means, if such exist, by which such property may be neutralized or prevented. Now experience has incontestably shown that, just as the disease never springs up primarily in a place where the atmosphere is fresh and pure, so it cannot continue to exist, far less to thrive, where such an atmosphere prevails. The same aerial condition is necessary for the reproduction as for the original production of the morbid germ.

It is by acting upon and giving effect to this simple rule of sanitary art that Quarantine may be made truly useful, and an instrument of much good. The actually sick, and those in whom the early or premonitory symptoms of the sick are present, should be removed as promptly as possible from the ship on board which they have sickened, and be transferred to clean and airy quarters, either on shore or afloat. Their chances of recovery will thus be greatly promoted, and the risk of the extension of the disease will be reduced to the minimum.

The detention and confinement of the crew and passengers who have been in perfect health during the voyage, and are so upon arrival, merely because they have recently come from a country where an epidemic disease existed when they left, or because a case of sickness may have occurred on board the vessel, and on he suspicion that the disease may be dormant in their systems,

or that its germs may be somehow or other clinging to their persons, appear to be unnecessary on the score of the public health, and might be safely discontinued. The practice has been rather based upon theoretical fears than derived from the results of observation and experience.

There is no reliable evidence to show that any pestilential disease was ever introduced into a country by the cargo of a ship, or by the ordinary articles of trade or merchandize; always provided that they were in a fresh, unputrescent condition, and excluding, of course, from the category such articles as the bedding and body clothing of the sick. Among the thousands of men who have been employed, since the beginning of the present century, in the lazarets of Malta, Marseilles, and Genoa, in handling the cotton-bales and other goods on board vessels from Turkey and Egypt, not a single instance of sickness attributable to the occupation has occurred. If this be true in respect to the plague, how much more must it be in respect of yellow fever, or cholera, the contagious property of which is universally admitted to be much less active.

It is to the ship itself far more than to the cargo on board that the attention of quarantine authorities should be directed. As a foul, infected ship may unquestionably be the vehicle of introducing disease, if allowed in this state to lie alongside other vessels, more especially in a crowded port, or close to dwellings on the shore, it is right that the most stringent measures of thorough cleansing and disinfection should be required before she is admitted to free *pratique*.

There is much room for the amendment of the sanitary condition of the merchant shipping of all countries; and just in proportion as this is more attended to, and the sanitary state of seaports is improved, so will the necessity for quarantine restrictions diminish.

Moreover, governments as well as peoples should ever remember that they have much more to dread from home-bred diseases never absent than from the occasional visitations of any foreign pestilence, however formidable it may be; and also that the very same measures which experience has shown will largely prevent the one will infallibly disarm the other of its power.

EDITORIAL NOTE.

It is fitting that we should add a note to the above well-timed article. We would direct particular attention to two "Parliamentary Papers" which have recently been published, the one

on "Quarantine Practice;" the other on "Quarantine Laws." At the annual meeting of the National Association for the Promotion of Social Science, held in Liverpool in 1858, Dr. Milroy read a paper entitled "*Quarantine as it is, and as it ought to be.*" In consequence of a suggestion made in this paper, the Association passed a resolution to the effect that it was very desirable that a committee should be formed to investigate the subject of Quarantine in its various bearings.

This resolution was immediately carried into effect, and a committee was appointed, comprising several of the most influential members of the medical profession, to wit, Sir William Pym, Superintendent-General of Quarantine, the Directors-General of the Medical Departments of the Army and Navy, Sir James Clark, Sir Ranald Martin, Dr. Southwood Smith, &c., also three Members of Parliament representing Liverpool, Manchester, and Glasgow.

In carrying out the investigation, the committee framed a set of queries calculated to elicit information as to the actual existing condition, and the past results, of the practice of Quarantine in foreign countries, as well as in our own country and colonies. These queries were transmitted officially to all British consuls abroad, and to the governors of all British colonies, by order of the Foreign and Colonial Secretaries of State. Thus, the most authentic information from all parts of the world might reasonably be looked for, and a safe groundwork laid for a satisfactory examination of an intricate and hitherto unexplored subject.

The extent of the inquiry instituted may be gathered from the "Parliamentary Papers" already referred to, which have been drawn up by the honorary secretary of the committee, Dr. Milroy, and which contain a digest of the leading information transmitted to the committee from all quarters of the globe. Upon this information the report of the committee will be founded, and this, we understand, is now in course of preparation. We shall await the appearance of the document with considerable interest, but, in the meantime, we are wishful to call the attention of the profession to the consideration of a highly important subject of State Medicine, affecting the interest as well as the convenience of all maritime and commercial countries without exception, and one which it behoves all medical men to understand, more especially those attached to the public service, and all who are called upon to go abroad or to practise in our colonies. It is obvious, from the details contained in the two "Parliamentary Papers," that the utmost diversity of practice exists in different countries in reference to Quarantine, and that many vague and ignorant ideas prevail on the subject. It is, therefore, high time that it should be brought within the field of rational inquiry.

Besides the mass of information derived from the replies of British consuls and governors of colonies, and also of several medical officers of the army and navy, the first-dated "Parliamentary Paper" contains a summary of the proceedings of the International Conference on Quarantine, which was held in Paris in 1851-2, and at which two delegates—one consular and the other medical—attended from all the Southern States of Europe, and also from Great Britain and Russia, as having possessions in the Mediterranean and Black Sea. But little practical good resulted from their six-months' deliberations, in consequence, chiefly, it appears, from the disagreement of opinion among the medical members. No account of the proceedings of the Conference had been made public until the above summary was prepared from the original *procès verbaux* of the Conference, for the information of the Quarantine Committee of the Social Science Association.

In addition to the evidence respecting Quarantine contained in the two "Parliamentary Papers," they will be found to afford some very interesting information about the appearance of epidemic diseases in different years in various foreign countries and in our own colonies. Might not a useful hint be taken from this result to lay the foundation for a wide-spread registration of pestilential diseases from year to year, through the instrumentality of British consuls and colonial governors—a registration conducted somewhat after the plan adopted in respect of meteorological and magnetic inquiries, and addressed to one of the departments of the public service? For this notion we have primarily to thank Dr. Milroy, as, if we mistake not, it formed the basis of a scheme for the registration of epidemics, which he submitted to the Statistical Congress, held in London last year.

In concluding this note, it is rendering but meagre justice to Dr. Milroy to remark, that both the profession and the public will owe a deep debt of gratitude to him for his labours—self-imposed and self-sacrificing—on Quarantine.—ED.

ART. V.—COTTAGE ASYLUMS.

By W. A. F. BROWNE, one of the General Board of Commissioners in Lunacy for Scotland.

"En principe tout hospice, tout établissement fermé, est de son essence et par lui-même la négation du traitement naturel; l'un est la prison, l'autre est la liberté." (p. 99.)—Duval: *Gheel, ou Une Colonie d'Aliénés vivant en famille et en liberté*. Paris, 1860.

"Ce n'est que dans un établissement central, que l'on appellerait infirmerie, que le traitement purement médical pourrait être administré; tant que Gheel en sera privé il restera un établissement incomplet." (p. 35.)—*Thérapeutique Naturelle de la Folie. L'Air libre et la Vie de la Famille, dans la Commune de Gheel*. Par Dr. J. Parigot. Bruxelles, 1852.

DR. WILLERS JESSEN has written as follows:—"Roller has repeatedly given his opinion against private, and in favour of public Asylums. He has not, it is true, given reasons for this preference, but should he continue to defend colonies for the insane, he must show how the reasons against private asylums and for colonies may be reconciled. Browne* has expressed another peculiar opinion. He adduces the following reasons against colonies:—Firstly, the incompatibility of such a plan with the general economy of villages and communities in Britain, with the tenure of property, and with the habits of the people. Secondly, the doubt whether the arrangement, if food, clothing, and medical attendance were provided, as in the asylums, would prove lucrative. And thirdly, the certainty that severity, cruelty, and neglect would arise when the responsibility is so small, the temptation to fraud and tyranny so great, and the chances of detection so few. An experiment," he continues, "of a somewhat similar kind failed in Arran. Even in asylums in which the superintendence is permanent, in which they have honest and respectable attendants, whose interest, as well as their character and ambition, are concerned in the prosperity, health, and love of their charges, there appear daily violations of duty and humanity; and these offences are quite as frequent against the weak and peaceable as against the furious. Even the dwellings of the patients are converted, through harshness and filth, into unpleasant places of abode.

"The hopes of philanthropists rest upon the combination of the cottage system with that of a central asylum, where the families of the attendants would represent the peasants, or where peasants would become tenant servants within the grounds, under the rule of the Medical Governor and his staff. This is, at all events,

* "Ueber Irrenkolonen und andere Nothbehilfe der Krankenpflege."—*Allgemeine Zeitschrift für Psychiatrie*, August, 1859.

original, and so much the more worthy of consideration, because its application might remove an evil which no colony can otherwise escape. As is easily seen, the reception of insane patients must raise the value of the ground, as also the price of farming and rents in the colonies above their worth in the neighbouring parishes. Only the original possessors, and perhaps the first purchasers will, therefore, receive the full profit from the board of the insane, &c. For the execution of the plan the asylum must, of course, possess a considerable area; but not of necessity the funds to raise buildings, for under suitable conditions, every colonist might be made to furnish money for the building of a dwelling. The buildings themselves would be erected and placed strictly upon medical principles, and sites would only be granted to proved trustworthy persons. All this appears very excellent, and gives an undeniable superiority to Browne's plan over colonies formed upon the discouraging model of Gheel."

To this article Dr. Mundy, the author of various pamphlets upon the same subject, such as "*Gheel est un Asile Patronal*," "*L'indifférence de notre siècle pour l'infortune des Aliénés*," has given an energetic reply in "*L'institution des colonies d'Aliénés; Gheel et ses Adversaires*." As, however, Dr. Mundy conceives that my proposal is a recommendation of Gheel, as he concurs in the propriety of rendering the hosts, or guardians, responsible paid servants; and, as he does not participate in the extreme views of Dr. Parigot, it will not be necessary to allude further to his labours.

There appeared in *The Journal of Psychological Medicine* for July, 1860, and in the *Revue Trimestrielle*, vol. xxvii., an article on the "Reform of Lunatic Asylums," by J. Parigot M.D., Inspector of Lunatic Asylums for the Arrondissement of Brussels, &c., in which these views are thus commented upon:—

"It appears (still following the remarks of Dr. Jessen, of Hornheim, near Kiel), that Dr. Browne, Inspector of Lunatic Asylums in Scotland, has made certain observations unfavourable to colonies. As Dr. Jessen reproduces these objections, we will answer the first one, to wit, that the financial administration of a village, subject to feudal rights, would prevent the establishment of a colony, by observing that Government in this country can buy up these feudal rights without injuring any one's interest, but, on the contrary, to the advancement of every one's interest, if a colony be deemed useful. As to the second objection, that, after all the expenses incurred for the keep and clothing of the patients, as in asylums, there would be no profit, we would reply, that this is a great mistake; for, admitting even that the expenditure was the same (which is not the case, as we have shown), there would remain a double number of cures to the credit of free air, conjoined with the rejection of useless discomforts for the incurables." (p. 293.)

Since the publication of this paper, the author has visited this country, chiefly to preach a bloodless and philanthropic crusade in favour of his own creed and against the prison-asylums, as he stigmatises them, which exist here ; and I have had an opportunity of cultivating his friendship and of forming a high estimate of his benevolence, enthusiasm, and ability. It is expedient to express thus explicitly and strongly the respect entertained towards Dr. Parigot, and the confidence placed in the sincerity with which he endeavours to propagate a new system of treatment ; because it will become necessary to characterize that system, and especially the mode in which it is advocated, in less approbatory terms. While fully appreciating the romantic interest, the historic prestige, the psychological curiosity, the substantial and, above all, the suggestive elements of good connected with the community of Gheel—it is foreign to the purpose and spirit of these observations to denounce, as M. Parigot has done, those who fail to arrive at the same conclusions, or who regard them as erroneous, as “speculators and traffickers” in madness (p. 280), whose “arguments depend upon their interests and their prejudices” (p. 294), “who may seek to retain captive unfortunate beings whom, most frequently, unnatural relatives, from disgraceful motives, wish to get rid of” (p. 280). Such a class I do not believe to exist in this country ; nor can I credit the assertion, “that passers-by are imposed upon,” or that it is the intention of any one “to impose upon passers-by by the sound of music, dancing, fêtes, and entertainments of various kinds, while the desire to cure is either altogether absent or lightly appreciated.” These rash accusations and the insinuations conveyed in the terms, “mercantile idea,” “contempt of science,” “personal interest,” and the bitterness of feeling from which they appear to emanate, and which they are undoubtedly calculated to produce, shall be placed out of view, and an attempt made to discuss the “*Traitement à l'air libre*,” &c., as a curative agent, or as a means of removing difficulties known to exist, and known greatly to embarrass and impede the exertions of men of science as well as of the philanthropist, in so far, at least, as these considerations are involved in, or affected by, the proposal made by the writer and commented upon by Drs. Jessen and Parigot.

As this suggestion has assumed, in the hands of such commentators and critics, somewhat the aspect of a discovery, and as it has become probable that establishments for the care of the insane may be constructed in accordance with this view, as the form in which it originally appeared must be unknown to your readers, and especially as that form has been somewhat distorted and shorn of its fair proportions in the attempts to illustrate or demolish, it may be prudent to introduce the following extract from page 8

of the *Eighteenth Annual Report of the Crichton Royal Institution for Lunatics, Dumfries*. It must, however, be premised that the existence of Gheel for centuries is not, as Roller* argues, a proof of its rationality, but merely of the practicability of retaining lunatics in one locality, partly by force, partly by superstition, partly by kind and indulgent management. The Gheel of a thousand years exists no longer. This is no protest against a modified form of the community. The humane impulse which has changed the condition of the lunatic in many lands was late in reaching West Flanders. The Gheel painted by M. Parigot, is of yesterday; it is inchoate, in progress and in the act of development towards that alteration now proposed.

“The moral evils of a vast assemblage of incurable cases in one building are greater still. The community becomes unwieldy; the cares are beyond the capacity of the medical officers; personal intimacy is impossible; recent cases are lost, and overlooked in the mass; and the patients are treated in groups and classes. An unhealthy moral atmosphere is created; a mental epidemic arises, where delusion, and debility, and extravagance are propagated from individual to individual, and the intellect is dwarfed and enfeebled by monotony, routine, and subjection. So pressing have these evils become, that remedies are anxiously looked for. The construction of smaller establishments increases the expense of maintenance so much, that additions to the staff of officers, the subdivision and classification of the inmates into distinct bodies, and the erection of separate buildings dependent upon a central administration and economy, and the introduction of the system resorted to in Belgium, of placing fatuous and tractable cases in the houses of respectable peasants, but under constant medical superintendence, and where their labour is received in payment of maintenance, have all been pointed to, as fully or partially meeting the difficulties. The objection to the scheme of erecting colonies for the insane, such as exists at Gheel, which was originally founded on religious views, subsequently persevered in for economic ends, and has latterly been placed under an enlightened policy, are first, the incompatibility of such a plan with the general economy of villages or parishes in Britain, with the tenure of property, and with the habits of the people; secondly, the doubt whether the arrangement, if diet, clothing, and medical attendance were supplied, as in asylums, would prove remunerative; and thirdly, the certainty that hardship, cruelty, and neglect would spring up, where the responsibility was so slight, the temptations to peculation and tyranny so many, and the chances of detection so few. An experiment of a somewhat similar kind in Arran terminated in failure. Even in asylums where the supervision is sleepless, where there are trained and respectable attendants, whose most selfish interests, as well as their character and ambition, are involved in the

* Roller, Lib, cit.

well-being, health, and love of their charges, violations of duty and humanity daily occur; and these derelictions are as frequent where the imbecile and gentle are concerned as the furious. Even the homes of the patients are converted into prisons and shambles, from positive callousness, or sordid selfishness. The hopes of philanthropists rest upon the combination of the cottage system with that of a central asylum, where the families of the attendants would represent the peasants, or where peasants would become tenant-servants within the grounds, under the rule and direction of the medical governor and his staff."

It will be observed that the merits eulogised by Dr. Jessen are rather inferences, or may be made results, from the application of the plan, than characteristic of its nature; for, although economic views are not disregarded, they occupied a very subordinate rank in the estimate of the writer. It will be further apparent that Dr. Parigot addresses himself to answer two only of the objections urged to the introduction of such a colony as Gheel into Britain, and that he has misunderstood these. The words, "feudal rights," do not occur in the passage cited; they never occurred to the thoughts of the writer. The "tenure of property," referred not to "feudal rights," but to the difficulty which must be encountered in a densely peopled country in acquiring a territory such as would be necessary for the purpose, and to the necessity for creating an agricultural colony previous to its conversion into a colony for the insane. The word "remunerative," was not intended to imply "profit," for such an element cannot enter into a consideration of the management of the affairs of the pauper lunatic, but "loss;" and it is still, in my opinion, extremely doubtful whether the number of cures be such as to justify perseverance in an experiment conducted as it appears to have been previous to 1856. Esquirol, upon the authority of Dr. Backel, who passed his life in Gheel, states, in 1821, that there were from 10 to 15 recoveries per annum in 400 or 500 patients. M. Duval, writing in 1860, represents the average number of recoveries as having been 36 in 900 patients, for four years. M. Bulekens, Medical Inspector of the colony, furnishes, in his Report to the Belgian Commissioners in Lunacy, 1856, a table which shows, that of a gross population of 765 lunatics, of whom 127 had been admitted during the year, 29 had been discharged cured, 10 improved, 32 unchanged, and that 6 had escaped, and 63 died.

In investigating the subject more in detail, it will be vain to accumulate a large mass of authorities upon the main points at issue, for Gheel has now a voluminous literature; but it will be expedient to adduce some of the evidence, and that chrono-

gically, which seemed to lay bare the inherent weakness of the principles upon which the colony was originally conducted, and upon the detection of which that project, now about to be realized, was founded. From a copious account of a visit paid by Esquirol to Gheel, in 1821, the following extracts will suffice:—

“The insane sent to Gheel generally labour under chronic, or incurable forms of derangement. It must not be supposed that the streets and fields are crowded with lunatics. I encountered a small number. The females do not go out much. If excited at home, their violence is speedily repressed. About 50 males are employed in farm works. The board ranges from 200 to 1200 francs. Those who reside in the village are much better attended to than those who are entrusted to the rustics. I have seen some who were comfortably accommodated, but the majority, *le plus grand nombre*, are very badly kept. No doubt can be entertained but that a higher degree of utility could be given to this singular establishment. I had the honour to propose to the Minister of the Interior (Holland) to erect an asylum which could receive such lunatics as, by their agitation, their violence, and filthy habits, are most exposed to bad treatment from their hosts; while the peaceable and cleanly might remain in private dwellings. The medical superintendent and his staff would, at the same time, be called upon to exercise a constant supervision over the isolated lunatics, and over the conduct of those to whom they are confided.”*

Stimulated by the narrative of my distinguished and much-loved preceptor, by a desire to examine so curious and ancient a community from a psychological point of view, and actuated, perhaps, by the spirit of adventure—for the spot was then a remote village in the middle of a sandy waste—I visited Gheel in July, 1838; and it may be considered a sort of distinction, I was the first medical man from this country who had penetrated the district. From the notes then taken some portions shall be given:—

“There are no gentlemen’s houses in the district; and the farm-houses, though neat, and generally surrounded by trees and a garden, are evidently in the hands of the poor. Even their frequency shows this. They are sometimes built of brick, but much more frequently they are constructed of wattled, or wicker-work, laid thickly over with mud or plaster, and whitewashed. The roof is large, deep, and thatched. Such are the residences of the peasants who inhabit the more distant, as well as the urban part of the commune. The interior consists of two rooms in front, and some sleeping cabins behind, opening upon a court. The apartments are large, paved with square bricks, having an enormous fireplace, above which is invariably a row of plates, generally of pewter. The houses are generally dirty and confused. The people

* *Notice sur le Village de Gheel, Maladies Mentales*, Tom. ii. p. 715-20, 21, &c.

keeping them seem to be about the rank of English cottagers, but are inferior in aspect, tone of character, and cleanliness of habits. The charge is almost invariably from 180 to 200 francs per annum. When they are admitted to the conventual building something additional is paid. For this sum they are lodged, fed, and supplied with bedclothes. Their body clothes are furnished by the commune to which they belong, or by their relatives. They, of course, eat with the family, who generally subsist upon bread, milk, and vegetables. I saw many of them at their meals. One had a mess of greens and potatoes, another potatoes fried in milk, a third potatoes boiled in milk, and a fourth was eating bread, but demanding tobacco. I visited the convent for the *better* treatment of the more difficult and violent cases. This is the only case in which it is freely acknowledged any treatment was attempted. It was hinted that the said treatment was of a religious character; but it is difficult to conceive what is meant by this, except a solution be found in the proximity of the house to the Church of St. Dymphna. The place is horrible—old, dark, dirty. The rooms in which the patients are placed are mere dens cut in the wall, with a window opening into the large common room. At the side of the fireplace are enormous rings and chains, which are intended to restrain patients when troublesome, and in winter. The impression produced by this awful scene and the coarse female who superintends the imposition of this restraint was distressing. I visited many of the insane in their cottages. The majority of those I saw in town were in bed; some of them bound to it by chains, and, with one exception, in the most disgusting state of filth and degradation. The smell and aspect of the dens in which they lay were intolerable. One man, formerly an officer of Lancers, tall, strong, hairy, will not get up, yet he was chained to bed. He passes everything where he lies, spits all round, howls night and day. His bed was of tan, or oak bark. The place was dark and loathsome; the whole house filthy. My informants said that about one-third are chained or strapped, to prevent them from striking or escaping. Many are employed in various ways, but especially on the farms and gardens of those with whom they reside. Considering that the houses visited in the country were worse, the lodgment of these unfortunates was better, but still very bad. They seem to entertain an affection for their keepers; and one, an idiot, expressed great fears that we had come to remove him from his mother. There was exhibited in one of these rural establishments the iron girdle used to confine the refractory. We met many of the lunatics wandering about in the lanes, some of them hobbled, confined, some of them free. All classes seem to depend upon this traffic. The burgomaster had a farm in the country, which I visited, and found there at least two insane boarders. There exists a commission, appointed by the town, and consisting of two medical men and of some of the respectable citizens, who examine into the condition of the boarders, and see that they are properly attended to. If this be not the case, the patient is transferred to another house. This is regarded as a great punishment by the keepers, as they depend greatly on the board. An institution for the insane has been suppressed, and the patients, 30 in number, sent to Gheel. Why is this?"

Apparently, in answer to such an interrogatory, my friend and fellow-labourer, the celebrated M. Guislain, wrote during the same year, 1838 :—"Gheel is a locality to which lunatics are often sent, on account of its cheapness. It is a sort of colony of lunatics, which, from the singularity of its aspect, has been an object of admiration, in which I do not participate."* It is understood that, towards the close of his life, M. Guislain adopted a more favourable opinion of the capabilities of Gheel.

M. Brierre de Boismont's examination of Gheel took place in 1846, and is recorded in a most valuable contribution to the *Annales Médico-Psychologiques*, vol. iv., Second Series, October, 1852, as a review of M. Parigot's *Thérapeutique Naturelle de la Folie*. It is only necessary to quote the following paragraph :—

"There is no treatment of alienation. I learned that the patients are never opposed. The dirty were a special object of attention. I found many of them seated and fixed upon a chair with a pierced bottom. I saw one blind idiot of excessively dirty habits; but, such was the care of his nurse, that he had no smell. The excited and destructive wore camisoles. I found many melancholics in bed. It is, without doubt, the way to perpetuate their malady. Nothing has been done for the physical or moral treatment of the patients. There are no baths, no infirmary for acute cases or incidental diseases. Elopers, mischievous, homicides, incendiaries, kleptomaniacs are chained. I entered about twenty houses. They were clean, resembling those of our peasants in furniture, &c.; and, though bare, were clean and tidy. The clothes were clean; the food that of the hosts. I would preserve Gheel, but solely as an establishment for the incurable."

Discussions took place on the pretensions of Gheel in the Parisian Medico-Psychological Society, in June and July, 1860.† Their most marked characteristics were denunciations, from some honoured lips, of everything that was not French, and the appointment of a committee of inquiry.

My friends Dr. Webster visited Gheel in 1856, Dr. Stevens and Dr. Coxe in 1857, and Dr. Mitchell and Dr. Sibbald in 1860; and I have read the various reports in which they have recorded the impressions received, but I have purposely refrained from availing myself of the important information which these documents supply, as I was desirous that my personal observations, as well as my opinions, should be contrasted and tested by competent authorities speaking the same language, holding the same faith, accustomed to the same habits and manners as the writers

* *Exposé sur l'état actuel des Aliénés en Belgique*, p. 11, 1838.

† *Ann. Médico-Psych.* Janvier, 1861, p. 107, &c.

who support the principle of insane colonies in its integrity, and, in an especial manner, by the distinguished physicians who have lived in the town, and are intimately acquainted with its condition and that of its inhabitants. Dr. Webster alone, it may be right to mention, espouses the cause of Gheel as it is; denounces the proposal of breaking up and discontinuing the colony as "an act of sheer vandalism; insane colonies should rather be established elsewhere, and thereby take advantage of former practical knowledge, based upon the long experience thus obtained. Other countries might even advantageously imitate the example thus furnished."*

This ascending series of selections is not given in order to depreciate the colony of Gheel; nor with any conception that it will lessen the wonder and admiration which it is calculated to excite; but to indicate the influences by which my own thoughts were directed *from* what existed *to* a future development, embracing some of the peculiarities by which it is marked; but likewise another and important element, that of an *Hospital*. The attempt was incumbent to endeavour to separate the astonishment and curiosity suggested by a community differing so essentially from all others, of which a considerable portion of the citizens were insane, at liberty and not amenable to law; which had subsisted for perhaps a thousand years, and which had been kept together by a tradition;—from its characteristics as an hospital for the cure of disease, in virtue of these very peculiarities, and by the operation of religious faith. The result, or residuum, of this analysis was to present the "ruins of living men," of all ranks and positions associated promiscuously with bluff and burly peasants, enjoying an amount of liberty still unknown, and of license still happily unheard of elsewhere, imperfectly superintended and apparently no longer under, or very indirectly under, the care of priests or physicians. It afforded, in fact, the last glimpse of a mediæval condition, incrustated with the stains and decay and corruption of a worn-out organization, where the faith in the supernatural had faded away, and the sun of science had not yet arisen. There was forced upon the attention these considerations:—

I. That there was and is no presiding and supreme medical authority, interpenetrating and overruling every department and detail, such as is required and eminently useful where bodies of men are individualized and deprived of a common purpose by insanity or crime. With great respect towards Dr. Bulckens, the free air system, as represented at Gheel, is medical nullifidianism, and inevitably entails the relinquishment of every, or many, other means of alleviation as omnipotent as fresh air. It is metonymy

* *Journal of Psychological Medicine*, vol. x. p. 235.

to designate the turning the insane adrift into the fields, or the most unlimited indulgence in the open air, a remedy. It is a condition of general health, it may enter into curative measures; but not more in insanity than in other disease. If itself remedial, lunatics at home or roaming over our mountains, as they still do in great numbers, would be most advantageously situate for recovery. It is not necessary to advert to the 871 pharmaceutical prescriptions issued to 765 patients in Gheel during the year 1856* farther than to illustrate the impossibility of treating insanity under the circumstances described, and the encouragement given to the heresy of trusting to moral aid exclusively.

The various calls upon the time and thought of the medical superintendent of a large asylum render the daily or frequent visits to his patients difficult and laborious. How such duties can be performed when nearly a thousand lunatics reside in distinct houses, scattered over a "*commune qui n'a pas moins de neuf lieues de périmètre*," and are generally engaged in the fields; even when the medical staff consists of a physician and four assistants—is not easily understood. Such visits in an asylum require frequently to be of long duration, and have for object to afford professional aid either to physical, or moral, or imaginary suffering;—they may be to determine progress, to inquire into the deportment of subordinate agents, the state of the dress, the apartments;—or to soothe and sympathise with, to plant a hope, or to uproot an error; but in the case of a colony where the patients may be far removed from inspection and redress, where they are servants as well as boarders, and may be treated as slaves; where they are subjected to the dominion or guidance of a whole family, and where a contract exists involving not merely their maintenance but their productive capacity and degree of usefulness and degradation; for a larger allowance is given for the dirty and demented than for the well-conducted and industrious,† and, by a strange miscalculation of the interests of a particular lunatic, a guardian is punished for negligence or failure in one case by imposing upon him another still more unmanageable and unprofitable;—these inquiries assume a much more grave and important and complicated character, in addition to the ordinary objects in view. The opinion of M. Parigot that a weekly visit‡ may suffice for any case is so inconsistent with the purposes in view, and with the conception of a lunatic under treatment requiring separation from his friends and extradition to the more remote farms in Gheel,—as to countenance the impression that a central building already exists, where acute and urgent cases are

* Bulckens, p. 39.

† Ib. p. 42.

‡ Parigot, p. 96.

deposited. The value of the supervision and of the moral influence established by constant medical attendance is such as to constitute a strong argument in support of what may be called the composite plan.

The scattered population of Gheel places it very much in the same category as those vast asylums in this country, where the physician has to traverse miles of passages and ascend staircases of mountain altitude; where an acquaintance with the mind and dispositions, and even with the name and features of each patient, is next to impossible; where the relation of friend and monitor is lost in that of director, and the knowledge of the very existence of the phenomena of disease must depend upon the reports of stupid, stolid, ignorant, and perhaps, unwilling witnesses. The detection and management of the various forms of insanity under such circumstances appears a problem to those who, like Bulckens,* have experienced the difficulty of making nurses understand that their charges are ill, and of teaching them, even when not allied to Mrs. Gamp, and in spite of Curwen's pharmacopœia, the commonest offices of the sick-room. And lastly, how the approaches of the abstinence so frequent as a symptom of melancholia and other forms of alienation, can be observed and watched amid such penury and ignorance, and when observed how counteracted, is perplexing. This is a momentous consideration in a Roman Catholic country, where fasting is a recognised expression of piety, and consequently, so frequently a symptom of the exaltation and exaggeration of the sentiment in disease.

II. There was and is no adequate guarantee for the humane or judicious care and management of the insane, or such as may be established under other circumstances, nor is there any advantage gained compensating for its absence. "All is to be attained by kindness, not by intimidation or violence." "At Gheel what is admired is the devotion and disinterestedness of the keepers."† Duval paints the population of Gheel as endowed with "*bonté naturelle poussée jusqu'à l'extrême limite, calme du caractère comme de la démarche, imperturbable patience, en toute occasion un faire tranquille et mesuré, que le délire le plus aigu d'un aliéné ne parvient pas à troubler.*"‡ Parigot deplures that it has been impossible to reward "*l'abnégation angélique de bien des nourriciers.*"§ Even the less ardent Bulckens declares "*les nourriciers s'acquittent en général de leur mission difficile et souvent périlleuse d'une manière qui ne mérite que des éloges;*" and he sums up these encomiums by these emphatic words: "It is

* Lib. cit., p. 26. † *Journal of Psychological Medicine*, p. 293, vol. xiii.

‡ *Gheel une Colonie d'Aliénés*, p. 67.

§ *Thérapeutique Naturelle de la Folie*, p. 119.

requisite to have a mission, which can only be inspired by religion, or be innate, as in the inhabitants of Gheel. To many these every-day cares, anxieties, and agitation have become a moral necessity of their existence.”*

I would most reluctantly impugn the self-sacrifice and self-control and “love casting out fear” of these virtuous peasantry, their nation’s pride; in fact, I am disposed to regard them as possessed of many excellent qualities. It is refreshing to find an Auburn, a Utopia somewhere, especially among the sand wastes of Flanders: it is not even necessary to quote the few instances of neglect and garotting recorded by Parigot,[†] of abuses alluded to by Bulekens, “l’abandon, un trafic honteux,”[‡] or the regulations now existing, in order to prove that man is fallible, as I have to deal less with the abstract practicability of such an institution, or with its practicability in another country, than with the propriety of introducing it into our own. It would not even affect the argument to admit the impeccability of the Flemings; but to those who have lived for a quarter of a century among the insane, who have expended every energy in selecting, resorted to every expedient in instructing, training, rewarding suitable custodiers, the statement that 548 families, or more than 2000 individuals, can be found, “devoted and disinterested,” by hazard, or having no other recommendation, and affording no other guarantee than residence in a certain locality, and that in some cases their ancestors were engaged in a similar guardianship; and that under the shadowy superintendence described, they, or a vast majority of them, continue to discharge their very sacred and difficult duties in a satisfactory manner, appears marvellous and delightful, and is assuredly altogether inconsistent with the experience of the medical governors of asylums. No one can be more alive to the trying position, to the rectitude, the forbearance, and the intelligence of many of the guardians of the insane than the writer; but he cannot forget, that, in order to secure the co-operation of individuals possessing such qualities, or some of them, hundreds of candidates must be tested and found wanting, failing even in the vulgar attributes of vigilance and attention; and that even those who occupy a higher place, who may be neither negligent nor cruel, rarely attain to a conception of “devotion and disinterestedness;” and are preserved in their status by sustained discipline. It must be farther noticed that the discovery and development of such qualities as entitle to trust, as well as the detection and punishment of unworthiness, take place under a system of daily, hourly, paternal superintendence, of constant and anxious scrutiny; and this within a compass and under cir-

* *Rapport*, 1856, p. 34.

† pp. 78, 79.

‡ p. 5.

cumstances which secure a knowledge of individual disposition and capacity and a scope for instruction not otherwise easily attainable. This rigid and far-stretching or inquisitorial arrangement is founded less upon low views of human probity and sympathy with suffering, than upon what is believed to be a correct estimate of the frightful ordeal to which the highest natures may be exposed; of the provocations, the danger, the exhausting suspicion, irritation, ingratitude, which must be encountered, and under which even the ties of affection, lifelong associations, and selfish interests so often succumb. The signal failure and inefficiency of this class of officials have led many physicians to crave a total reorganization of this department of service, and to propose to incorporate some modification of the plan of enlisting the religious orders in the management of the insane, with our existing economy in asylums; or, at all events, to resort to some plan which may secure assistants actuated by higher motives than their subsistence, and from other classes than the idle, the illiterate, and the refuse of other trades, which at present generally supply them. Duval demurs to the employment of sisters of charity, as they cannot possess the "hereditary merits, &c. of the inhabitants of a country devoted to the treatment of such maladies" (p. 84).

It may be that confinement, monotony, that close constant association with unhealthy and debased minds, act detrimentally upon the disposition of those who are imperfectly constituted and educated, and tend to produce that indifference, hardness, harshness, and enfeebled conscientiousness which so often frustrate the hopes and measures of the physician. A similar morbid and malign influence must, however, if it exist at all, be diffused through the homesteads of the yeomen of Gheel by the constant presence of the insane inmates. It must present itself in even a more insidious and intense form. The exposure of the attendant to the infection is limited to hours. He escapes to his family, his home, his holiday. He spends his vacation in sleep, or amid healthful and invigorating impressions. But the skeleton, the demon of disease, haunts the Gheeloise hut for ever. It is a part not merely of household arrangements for good or for evil; it is a part of the inmost thoughts. In many examples recorded, and in thousands of others that literally waste their moral fragrance on that desert air, the imbecile is a child, a companion, a joy, a source of wealth and food; but he must still be a care, an anxiety, a pain; his presence cannot, in the majority of instances, regulate the passions, elevate the intellect, calm the temper. Nay, the same observation, to a certain extent, applies to those intrusted with the insane in their own houses; to the parents, relations, natural guardians. In one sense every parish in Scotland is an extemporised Gheel.

In one of these, possessed of the legal organization of a parochial board, inspector of poor, and medical officer, there very recently prevailed the following system of treatment, or precaution for the safety of the public:—Of twenty-two individuals labouring under different forms of mental disease, two were not seen; one was in bed; of six, the liberty did not seem to be interfered with; the subjection of one was secured by threats of a stick; two were confined to the house; one was shut, another locked into their bedrooms, when it was conceived necessary; one was manacled and shut into a box-bed; one was struck with the hand; and six were struck with what were called switches, but one of these assumed the proportions of a full-grown bludgeon in the eyes of those unaccustomed to such heroic measures. There was, possibly, no intentional cruelty in all this; but although resorted to as salutary or necessary discipline, it was undeniably the result of gross ignorance, irresponsible power, and domestic tyranny.

The jealousy of the public among us is keenly alive to the possibility that an educated man, enjoying a reputation for honour and integrity, and occupying a position which depends upon the possession of such qualities, may be blinded to the less palpable forms of mental disease and to the faint dawnings of convalescence, by interest in the prolongation of illness in an affluent charge: but to what extent would suspicion be justifiable in the case of the 584 nurses and their families, who are ignorant, indigent, and depend for sheer subsistence upon the board and the labour of their lunatic servants, may be inferred from the observations of M. Parigot (p. 17), as to the odious traffic in Lunatics, and from the Regulations* for 1838 containing prohibitions against bribes; authorisations for the imposition of restraint during excitement, or to prevent escape; declarations of “infamy” against those who strike a lunatic, except in self-defence; small fines on the occurrence of suicide; accidental death from negligence; on the discovery of dirt, ecchymoses, or gangrene!

III. That “*Ne pas contrarier l’aliéné, lui permettre même toutes ses fantaisies tant qu’il n’y a dommage, ne lui rien imposer de force, tout obtenir par l’attrait, cette est la science suprême du gouvernement des fous à Gheel*,” is very dangerous, as well as false philosophy. In such phrases as “nothing opposes him,” “he does with his time just as he pleases,” used by Parigot, appear indications of an erroneous view at once of human nature, the very framework of sane society, and of the moral treatment of those of unsound mind. The condition of the greatest and most

* v. Parigot, Duvac.

independent intellects is imperfect, if they have been opposed in nothing. Education consists in a series of restrictions, concessions, sacrifices to the will and interests of others; society is kept together by antagonism, as well as by concurrence, by the absorption of the individual will, wishes, tendencies in common interests and before laws, authority, conventionalities; and lastly, the uprooting of irrational opinions and modes of action, the opposition to excited passions and propensities, the exposure of delusions, and even the subjugation of capricious and irregular habits to order and punctuality accomplished directly or indirectly, as may be required, constitute more effective means for the cure or mitigation of insanity, than a course which affords gratification through indulgence and non-interference, and purchases quiet at the expense of perpetuating disease. That a remedy is of doubtful efficacy or effect, or to be discarded because it is painful or repugnant to the patient, is as unsound doctrine in the treatment of psychical as of physical diseases. It sometimes happens that the pain and the repugnance are in themselves remedial; that actual cautery has roused attention, or diverted from mental sorrow and suffering to the irritated skin. Believing that the impression produced upon the wandering and disorderly and rebellious mind by the known existence of discipline, and of a mild but majestic authority, such as pervade our asylums, even where their requirements are scarcely felt; and by the obedience of the propensities, and peculiarities, and pursuits to guidance and government, and by their fusion into a general movement, are eminently beneficial, it is impossible to regard with complacency the negation of such influences, and of *all* substitutes for them, and the virtual abandonment of one of the most important means of moral treatment at Gheel, and the delivery of the diseased over to their own impulses, or to those of the good-natured but unenlightened persons to whom they are intrusted, often inferior to their charges in capacity, energy, and education, and who, in many cases, do not speak the same language, and cannot communicate advice or admonition were they so disposed. M. Bulckens, generally so modest and free from partisanship, in making the confession "*on a objecté contre l'établissement de Gheel que la séquestration des aliénés dans une localité où on ne parle pas leur langue,*"* actually enters upon a lengthened series of propositions to demonstrate that, far from being unfavourable to happiness and recovery, this isolation presents incontestible advantages!

IV. The amount of restraint is painful and unjustifiable. Much of it is permanent; and in an expurgated body of lunatics, which

* *Rapport*, p. 35.

is not only originally selected on the ground of the tractability and gentleness and perhaps of the incurability of its members; but from which individuals, homicides for example, are from time to time withdrawn as they become unmanageable,* and out of which the impatient and recusant remove themselves by evasion,† it must be attributed to the timidity of the custodiers, a quality almost incompatible with kind management. Again, it is resorted to, not even upon the pretext of treatment, or to facilitate the application of treatment, but upon the bald, broad, intelligible reason of coercion, to repress, to confine. During 1856, it is ascertained from a table, prepared by M. Bulckens,‡ that eight patients had worn the camisole, sixty-five ankle-chains, twelve the iron girdle with wrist-chains, and eight the iron girdle with ankle-chains; in all ninety-three. Dr. Mundy saw some leg-chains, but no camisole nor strong chair, in January, 1860. Dr. Sibbald, in the spring of the same year, encountered about thirty patients confined by manacles or some "more gentle means of restraint." It does not enter into the speculations of the extreme defenders of the "air libre," that personal liberty and even the gesticulations which are resorted to under restraint, may be prejudicial; that the economization of strength and tissue by some means was considered a justification of the use of the strait jacket and padded rooms; that exercise is interdicted in mental diseases of cardiac origin; that one object of seclusion in an asylum was to remove from noxious and disturbing influences, to obtain rest and quiet; another, to render treatment of any kind practicable; a third, to protect the sufferers from evil; and a fourth, to minimise or abolish personal restraint; or lastly, that the most eminent psychologists, though repudiating the notion that any mysterious or therapeutical influence is attributable to the mural or other inclosures around an asylum, or to its size, are well assured by experience that discipline and treatment can be better applied in one particular form of a house than in another, and, to a certain number of inmates. In place of there being an antithesis, as M. Parigot says (p. 285, *Psych. Journal*), in giving liberty to a number of lunatics forcibly kept together within restricted limits, Gheel, and the restraint used there, may be adduced in illustration of the proposition that, as a consequence of structural arrangement in a central building, personal liberty becomes practicable and safe.

A Frenchman, it may be recollected, at one time recommended that strait-jackets should be made of velvet for the patricians, and that muffs should be decorated with ribbons in order to render

* Dr. Webster, vol. x., *Journal of Psychological Medicine*, p. 220.

† B. de Boismont, op. cit. p. 531.

‡ *Rapport*, p. 32.

them less humiliating. I do not know that golden chains or crinoline strong dresses ever came into fashion; but it is certain that the publicity with which the badge is worn, M. B. De Boismont first heard the clank of chains during a religious procession; and the reasons for which it is known to be worn, must brutalise both the wearer and the spectator. Apart from this consideration, it is, perhaps, better that the iron should enter into the soul in the open air than in a vitiated atmosphere.

V. That there does not appear to be such an amount of employment as to distinguish the community from other large bodies of the insane differently situate, and as is claimed as a distinction; and, as might be expected, where there is not merely an interest, but a stern necessity, to tax the physical powers of the industrious to the utmost; where there is an investment in muscular force or dexterity, and labour becomes the payment of an obligation rather than a cure for madness. There is, in the fourth article of the special order of 1851, a provision against tyranny and exaction of this kind; but how such an offence can be detected it is difficult to understand. M. Parigot sneers at classification, as serving but to ‘render life more endurable to the prisoner.’* The endurability of life is an important mode of cure or amelioration. It may be a matter for inquiry whether the presence of a dirty element would promote or impede the recovery of a melancholic or a monomaniac; but there can be no doubt as to the propriety of that grand step in classification, which “deprived the colony of all lunatics suspected, on whatever grounds, to have suicidal, homicidal, or dangerous propensities” (p. 284, O. C.), a measure which, in conjunction with the segregation of the patients actually sent, renders Gheel itself the most striking example of classification carried, I do not assert to extravagance, but as far as it could go. By a very inartificial but perilous arrangement, and for obvious reasons, the colony is divided into three cordons or circles. The docile reside in the town; the more excited, amounting to 263, in suburban cottages; and the agitated and turbulent, 34 in number, are placed in the most distant and inaccessible hamlets, which are identified with seclusion-cells, and where the exiles may shout and wander unrestrainedly among the woods and wilds. A classification of the persons authorised to receive the insane has been attempted; but it is founded chiefly upon economic considerations and irrespective of mental qualifications, except in so far as these may incidentally be comprehended in regulations concerning moral deportment, attention to cleanliness, sufficiency of food, and the salubrity of the site of the house. It consists, 1. Of those who

* *Journal of Psychological Medicine*, vol. xiii. p. 283.

possess houses of their own. 2. Those who are tenants of the houses which they occupy. 3. Those who are the proprietors of the farms which they improve by the aid of their boarders; and, 4. Farmers in the country. The board of all the paupers is the same, but an additional sum is allowed where the habits are degraded. It would appear, however, that a robust and active labourer or handicraftsman is coveted as a good bargain, that a species of competition has been detected in the attempts to secure such a charge, and that bribery and corruption have been resorted to in prosecution of this end.

M. B. de Boismont reports that on the 1st October, 1840, of 681 individuals, of whom 324 were men and 357 women, 372 were engaged in occupation of some description, 309 were unable or refused to work, and that, in addition to these, 36 men and 13 women were in seclusion or under restraint, and consequently prevented from working; making a total of 358 who did nothing.*

He lauds the products of their industry. It may be interesting to compare with these observations the results in two British asylums, of nearly the same amount of population as Gheel, and of which a large majority labour under dementia, where agricultural labourers must be in a minority, and where labour is not inculcated as a panacea. In Hanwell, during 1856, of 507 men, 250 were employed, 114 in open air, 52 in galleries, &c.; of 657 women, 388 were employed, 20 in open air, 160 in wards, 186 in needlework. In Colney Hatch, during the same year, of 546 men, 246 were employed, 69 in open air, 80 in galleries; as upholsterers, 13; as carpenters, 11. Of 748 women, 503 were employed; in galleries, 125; in laundry, 72.

M. Parigot offers objections to work performed in an asylum; first, because it is compulsory; and secondly, because it is not in the open air.† There is, however, another paragraph by M. Parigot, which considerably modifies the force of the first argument. “La première violence morale surmontée,” he says; “l’aliéné s’étant soumis (quelle que soit sa repugnance à s’occuper de travaux qu’il croit de lui) la diversion s’opère,” &c.‡ But why should labour be more voluntary in a colony which a man cannot leave in consequence of iron cinctures, straps, &c., than in a confraternity from which his escape is prevented by walls; when in both it is the means of distraction, enjoyment, the price of additional indulgence or confidence, the proof of returning sanity, the condition upon which liberation depends. As to the second objection, it is very doubtful what would be the physical effect of compelling the population of heated manufactories, the

* Op. cit. p. 529. † *Journal of Psychological Medicine*, vol. xiii. p. 289.

‡ *Thérapeutique Naturelle de la Folie*, p. 76.

smiths, forgemen, moulders, &c., to engage in field labour; but it may be predicated as certain, that while, for special reasons, it may be wise to convert an engineer into a hewer of wood or a drawer of water, or to make a king trundle a barrow; that the moral effect of one inflexible rule enjoining physical labour upon all, upon expert and educated artisans, to the disregard of the healthy and habitual exercise of their natural faculties and acquired tact, would be detrimental and inoperative. But it is not perfectly clear that the *air libre* is really the panacea at Gheel which has been extolled or condemned so energetically.

In 1856, Bulckens announces that of the *tranquil* lunatics, about four-fifths were labourers, and were employed out of doors or in domestic matters. The remainder are enumerated as shoemakers, tailors, joiners, smiths, bakers, curriers, cooks, sempstresses, lace-makers, &c.,* and are very properly engaged in their original trades. He does not supply the comparative numbers, but from the table of admissions it is discovered that of 127, 49 came from towns, 78 from the country (p. 14); and that of those whose occupation could be ascertained, none of the female and more than one half of the males had been accustomed to ply their trade out of doors.

A table furnished by M. Parigot† shows that of 204 patients employed out of 340 chargeable to Brussels, 20 worked on their own account, 40 for their guardians, who paid them 50 centimes per week, 44 assisted in the house, and 98 could do nothing more than pluck legumes.

There are several valuable principles evolved by these statistics. There is, first, the fact that about one half of the insane population is occupied; secondly, that they have access to pursuits and trades in harmony with, and calculated to exercise, their former knowledge and acquirements; and thirdly, that they have, or some of them have, a real interest in their labour, whether the money paid be regarded as an encouragement, a reward, or as wages. But what light do these figures cast upon the "*air libre*" system? They would appear to show that whatever advantages it may possess, it does not induce a greater number of the insane to engage spontaneously in real or even nominal activity than the moral suasion, the example, the rewards, the deprivations resorted to in asylums. Genuine spontaneity, however, appears apocryphal in the face of 50 centimes and the necessities of the guardians.

But further; it would appear that of 730 individuals returned in 1846, only 116 were agricultural servants, and enjoyed to its full extent muscular exercise in the fresh, health-bringing

* *Rapport*, p. 46.

† *Thérapeutique Nat.*, p. 86.

breeze; that according to another account, and at another time, about one half of the active class confined their exertions to plucking beans, and that at least one-fifth (Bulckens) of the tractable, and permanently industrial because tractable class, were smiths, bakers, lacemakers, &c., who could not pursue their calling in the open air, and who are condemned to a stationary, if not to a sedentary vocation. It would not avail to press these illustrations further, but even at this stage, they point to a reduction of the claims of this system as peculiar, or distinguished from the experience of well-regulated modern asylums, in regard to the industrious class of inmates, within more moderate limits: while it leaves an undisputed superiority in the amount of freedom conceded to the idle, the excited, and those under restraint.

But, while open to what appear drawbacks, and to some insurmountable objections, when regarded as a mature institution as then in operation, or as the *sole* means by which a whole class of diseases was to be combated, Gheel contained in its arrangements the germ of further development in itself, and suggestions for modification in the existing views and practices of psychologists. The capacity for improvement supposed to be detected, was in the provision of means adapted for the treatment of cases which were obviously neglected or maltreated, while the village was preserved as the residence of others; and the example offered for imitation consisted in the country life, the domestic habits, the contact with healthy minds, and the minute classification which might be effected. My reasons for entertaining this subject, apart from Gheel, and for giving it long and anxious thought were:—

1. The crowded state of asylums, and the conviction that many of their inmates might live happily and usefully under a less rigorous rule and routine than what is essential to the management of an hospital.
2. The importance which I attached to the separation of certain, and the grouping together of other classes.
3. The attainment of the home feeling, the home life, under certain limitations.
4. The belief that any arrangement is preferable to unsupervised management among strangers.
5. The impression that small groups, or families, are in keeping with the character and early habits of my countrymen.
6. The continuation of the influence of the asylum beyond the atmosphere of the asylum, and without the disturbing causes to which it is liable; and
7. a profound conviction that for many classes of the insane, irrespective of the dangerous, &c., the restraint of an asylum is salutary, and a positive source of happiness, and of greater moral and intellectual health and strength than could spring from any other mode of life.

But in publishing a *vidimus* of these views it never was contemplated that the principle of asylum life should be abro-

gated, that every household was to be an independent society, every house a separate asylum. Even in criticising the theory, Jessen writes:—

“If, in the construction of asylums, this were taken into consideration, parts of them would be so arranged that their inhabitants could enjoy almost unlimited freedom. That the patients should be compelled to lead a regular mode of life and diet can be by no means considered an objection, especially as the permission to make any deviation from this will rest with the physician; and punctuality, even to a minute, should be provided for, &c.”

The object aimed at was the incorporation of cottage residences with a central institution, of which the tenants were to be salaried officers, and in no degree dependent upon the work of their charges; from which all authority was to be delegated, all instruction, superintendence, medical and moral prescriptions were to issue; and towards which all appeals, applications, all desires for society, amusement, worship, were to gravitate. It might be matter for consideration whether the community should be surrounded by walls or other enclosures, although I conceived such an arrangement important; whether the dwellings should be solitary, or grouped together; limited to the territory specially belonging to the corporation, or that its roots and ramifications should spread into the adjoining hamlets and through the surrounding country. But it was my opinion that, whatever arrangement was adopted, the different houses should form parts of the one asylum, and be subject to the same influence and rules, or to such modifications of these as might seem advisable to the medical officers. I shall not shrink from the honour or discredit of having formulised this idea, or of having proposed its practical application as a mode of providing for and *treating* large classes of the insane. Several asylums recognising the benefits, or at all events the pleasures, of segregation and domesticity have already embraced this view, and clustered cottages around a central building. The object, however, in such instances as Devon, Aberdeen, &c., has been either to accommodate surplus numbers of chronic cases; to gratify, rather than to treat or to restore to reason; to carry out that training which is called for, and which produces such marvellous results after the chronicity and incurability of mental disease are recognised, and which is undertaken to mitigate, or elevate, or apply the characteristics of the morbid condition.

In the treatment of convalescent patients, or those discharged on trial, Dr. Bucknill anticipated or sanctioned the proposal that a part of an asylum should assume the form of a village. In the Report of the Devon County Asylum he writes:—

“A limited number of patients have been discharged on trial, and

boarded with neighbouring cottagers, selected as trustworthy and amiable persons. In several instances the women of these cottages have *acquired* some experience in the right management of the insane. Some of them have been employed as occasional attendants or domestics in the asylum, and others have married asylum artisans. This experience has made them willing to accept, and qualified to undertake, the charge of such inmates of their homes. Both the patients and the persons having charge of them feel themselves under the eye of the medical superintendent, who visits them unexpectedly. The patients are extremely well satisfied and happy.”*

A more close approximation to what is proposed is found in the following sentences, which appeared in the *Scotsman* newspaper, September, 1857, and are from the pen of my friend Dr. Coxe:—

“There are two ways in which the fundamental principles of the treatment followed at Gheel might be carried out. The first is, to place the patients in small houses or cottages on a large estate, under the care of paid attendants. There would in such a case be a large central house, for the reception and treatment of cases requiring special care; while the other patients would be distributed in smaller houses, according to the peculiarities of their mental affections. This plan would be a vast improvement on the present one, of gathering together all the patients in one large building and the system of Gheel might thus be gradually and naturally introduced by removing the peaceable patients, and placing them with cottagers in the immediate neighbourhood of the parent house.”

A “large estate” did not, of course, enter into my scheme. I had objected to such an arrangement as impracticable, on the ground of expense; and I regarded it as unsafe, on the ground of the distance of the members of the community from observation and treatment, and as destructive of the asylum principle. The plan, as it commended itself to my approval, did not, moreover, restrict the cottages to being depôts for demented, or homes for convalescents, although both of these classes, or individuals belonging to them, might have found shelter in them; but recognised them as parts of the general asylum, and designed them as available for various objects in classification, and during treatment, and in various forms of mental alienation. In so far, however, as Dr. Coxe’s suggestion embraces an agglomeration of small houses around a central building, and that the custodiers of the insane should be paid attendants, our views are the same.

It is difficult to trace the growth of a conviction, or the elements of which it consists, but I am inclined to think that recollections of the application of a somewhat similar arrangement to the treatment of the higher classes in the establishments of Esquirol at Ivry, and Fox at Brislington, as well as my knowledge of what

* Quoted by Dr. Webster, *Journal of Psychological Medicine*, vol. x. p. 237.

Gheel did and failed to do, may have emboldened me in suggesting such a course. But my suggestion was not founded solely upon such isolated facts, but upon my own experience, and that of others, as to the extent to which the insane may safely and beneficially reside beyond the boundaries of an asylum, in offshoots or dependencies; may mingle with their fellow-men; and of the ease and rapidity with which the apprehension and antipathies of the sane as to such associations may be overcome, and the most timid familiarized with those they have been accustomed to regard as outcasts, and to endow with repulsive qualities. Some of the steps by which this result was arrived at may be illustrated by the following extracts:—

“To render this transaction gradual and safe, it is now frequently recommended, wherever affluence permits such a step, that patients who have recovered should pass a certain period, the duration of which is determined by the result of the experiment, in the residence of educated families in the vicinity of the institution. The arrangement emancipates from the stern rule of confinement without the concession of perfect liberty, from the atmosphere of the asylum surcharged with distorted views, exaggerated feelings, unbridled propensities; and affords the comforts of home and the society of healthy minds, beyond the limits, but within the moral influence of that authority to which the individual has been accustomed to yield. It revives former habits; it multiplies the tests and trials to which the restored reason must be subjected, and imparts confidence to the patient, and affords a guarantee to others of the reality and stability of the mental change; it institutes a re-education in the modes of thinking and feeling, and in the conventional amenities and graces which seclusion and protracted disease have a tendency to obliterate or impair. Many establishments of this kind have been founded and are now in operation; and, without having any connexion with the institution, may be regarded as dependencies to which the advice and authority of its officers penetrate; and which in this manner, extend the benefits of treatment to fickle and feeble capacities through varied ramifications of society, and into the centre and common walks of life. Such a course is not only probationary, but restorative. It becomes an extension of discipline deprived of its repulsive restrictions.”
—(*Report, Crichton Royal Institution for Lunatics*, 1853, p. 9.)

“Members of the community have passed the summer in the country. The connexion with the Institution has been maintained by constant visits from the officers; so that while the pursuits and pleasures of rural life poured balm into the troubled spirit, the influence and advantage of discipline were less perceptible, but not relaxed. The emancipation from monotony, which is as irksome to some minds as restraint, and the total change of impressions secured by this expedient, have not been counterbalanced by any accidents or difficulties. It must be restricted to the affluent. The west coast of Scotland is brought so close to Dumfries by railway communication, that a party enjoyed the benefits of seaside exercise as well as of change of scene.

One party paid a visit to Ireland and England, which demonstrated, at least, the practicability of such an arrangement.”—(*Report, Crichton Royal Institution for Lunatics*, 1855. p. 36.)

“Patients have visited distant towns, have gathered the arbutus on the shores of Killarney, have mingled with the multitudes that crowd the Crystal Palace. Forty excursions have been made to the environs. A corps of anglers has explored every stream and many a lake in the district. Pedestrian excursions have been made to the summit of Criffell. It is confidently believed that upon no occasion has this liberty been abused; while the pursuit of game was most enthusiastically prosecuted, the sportsmen were led into scenes of great natural beauty and historic or romantic interest; were introduced into grounds and woods, and sometimes to the hospitality of the proprietors, from which they carried back impressions calculated to cheer the gloom of winter, and to displace the harsh and jealous thoughts sometimes entertained of their fellow-men.”—(*Report of the Crichton Royal Institution*, 1856. p. 34.)

“Parties have resided at the seaside during the summer and autumn, received visits from their companions, and formed central points for excursions, bathing parties, and scientific expeditions. But the numbers were limited; the individuals belonged, and must continue to belong, to the affluent classes, except where indisposition demands such a change, and some special arrangement, as has happened, enables the superintendent to prescribe change of scene as a remedy. This principle has been extended. It is not merely permissible to speak of summer colonies, but of a permanent offshoot which is connected with, but is not a part of, the parent community. An ample mansion, in a well-wooded park, emulating the aspect and luxuries of a gentleman’s residence, is not merely a home for convalescents, it is the portal which, to the affluent classes at least, may lead to the world of health and activity, it is a connecting link between perfect liberty and complete seclusion; it may become a scene of probation for those who have, under discipline, proved themselves capable of self-control; and where those whose temper and tendencies and habits are incompatible with the harmony and happiness of friends, or families, or communities, may find rest or exercise, as may be prescribed, and where the capacity of the one class for greater privileges, and the justifiableness of greater restraint and stringency in the other, may be tested under the most favourable circumstances. Already have the utility and benevolence of such an expedient been demonstrated. Already is this hospitable home a resort of many of the inmates, where they approach the confines of the society from which they have been excluded, without passing beyond the influence of the discipline which is to them in place of will, and self-control, and responsibility, and where for a time they lose the consciousness of that isolation, which mental disease creates, amid scenes and pursuits, and associated with minds which have all the novelty and freshness of health and freedom.”—(*Report of the Crichton Institution for* 1857.

In admitting the superior qualifications of the Flemings to the

race in this country in the management of the insane, the application of such principles as have been followed in Gheel is thereby limited and localised. While we must continue to look upon such an anomaly through our individual and national principles, and, it may be, prejudices, much that is claimed by such earnest and honest advocates as Bulckens, Parigot, Duval, Mundy, as to the treatment of the insane, present and potential, may be accepted; and while we continue sceptical as to the wisdom of introducing such a scheme into this or other countries, to the exclusion of every other mode of treatment, even of tried utility, we willingly receive the following as a description of the future and of a revolutionised Gheel:—

“L’arrangement et la propreté des logements, l’abondance et la bonne nourriture, le contentement des pensionnaires, sont des faits constatés qui n’admettent que de rares exceptions. Les chaînes et les entraves grossières ont partout disparu pour faire place à des moyens plus humain et aussi plus efficaces. Le ‘no restraint’ fait journellement des progrès: les aliénés jouissent généralement de plus grand liberté. Les évasions sont peu fréquentes. Les proportions des guérisons augmentent. Tout annonce enfin l’époque où la colonie de Gheel réunira à la fois les avantages d’un régime convenable de traitement à ceux du régime de la famille et de la liberté.”*

“Si nous possédions une infirmerie, nous en ferions une maison mère, un point central où les aliénés paisibles auraient leur recours, comme cela se pratique déjà aujourd’hui à notre refuge provisoire. Nous tâcherions d’y organiser des réunions pour nos aliénés valides, des récréations, des exercices artistiques et littéraires, des instructions religieuses,” &c.†

Controversy upon the size, or distribution, or even the precise destination of this centre of the new system would be idle. The erection of such a succursal building is an abandonment of the special constitution, and it may be of the special defect, which gave to Gheel prominence and popularity; and, what is of more significance, it assimilates the community to those which have already conferred such inestimable benefits upon humanity, and will augment the resources and success of the colony. The proposed fifty or sixty beds might be prudently doubled, but even these will enable the physician to practise his art; they will accommodate the aged, the infirm, the debased; they will tend to diminish, perhaps to extinguish, personal coercion, without, as is feared by Duval, as the expositor of the patriotic and conservative inhabitants, substituting imprisonment. The hospital will become what a capital is to an empire,—the seat of power, and law, and government, the source of intelligence and information, a succour to the feeble, the oppressed, and destitute.

* Duval, op. cit. p. 177.

† Bulckens, op. cit. p. 41.

ART. VI.—MODERN SURGERY.

It must surely appear strange to some of the older men in our profession to look back upon the practice of early years, to note what advances have been made within the space of a single lifetime, to observe how the strongly expressed opinions of some successful surgeon or physician have exercised for a time a dominant influence over many departments of professional knowledge, and how statements and facts, once thought irrefragable, have been extended and modified or altogether overthrown by increasing experience and wider knowledge. Not that the great principles of medical science are ever fundamentally changed. The aphorisms of Hippocrates contain the germs of much that later times have only more fully developed. And it would not be difficult for a good pathologist of the present day to reconcile many of the conflicting opinions, and settle the acrimonious disputes of the solidists and humoralists of the last century. In many instances, like the shield between the knights of old, the same fact was only different because looked at from different sides, and were we now to revert to their wordy contests, let us hope that, like the fox in the fable, we should be able to extract the oyster and leave the old combatants the empty shell of disputation to divide between them.

Yet, though it be admitted that the fundamental doctrines of our science do not materially change from age to age, yet the precise method in which these doctrines are to be applied to the treatment of any particular disease requires constant modification according to circumstances. Hence the value of experience. Were it not so, the young man, fresh from the schools, familiar with anatomy and physiology, and learned in all that books can teach him of medicine and surgery, would be trusted in more by reason of this knowledge. Yet the old man maintains, as he probably ever will maintain, his position of superiority, because the doctrines that we teach or learn are always empirical; because the application of medicine or surgery can never be made a matter of rule; because the practised hand and eye, the cool head, the calm judgment of mature age are constantly required, and it is but seldom that in any of these the young can contend with the old.

As in the wide field of microscopic research, it is not that we now require a higher magnifying power, but rather the careful and diligent application of the powers we possess to the elucida-

tion of the difficult and obscure; so in surgery and medicine, it is not that we require more means, but rather that the means and knowledge we have already obtained should be well applied. Our arms must not only be bright, polished, and fit for use, but we should have the skill on occasion dexterously and skilfully to wield them.

The time is yet far distant, it perhaps may never arrive, when every organ whose structure has been seriously impaired either by disease or accident, or whose function is materially disordered, will be certainly and completely restored by medical treatment. Yet so many instances of recovery from various forms of disease in many of the organs of the body might be adduced, that we can scarcely help believing that all are equally amenable to treatment, if we possessed only the clue which might guide our practice. That clue is undoubtedly to be derived from a threefold source: from a careful investigation of healthy structure, from a close observation of the causes and results of disease (ætiology and pathology), and, lastly, from assiduous and careful examination of the effects of remedies. How necessary a consideration of all these circumstances is may be shown by a reference to a disease over which we have a very complete control—iritis. Iritis is an affection attacking one of the most delicate muscular and vascular structures with which we are acquainted, running a rapid course, accompanied by severe pain, generally resulting, if left alone, in the entire abolition of sight, and in irremediable alteration of structure. But we happen now to hold the clue. We know that opium will relieve the pain; that calomel will, as Dr. Billing believes, prevent the effusion, or, as others suppose, promote the absorption, of lymph. We administer them together, and, though not absolutely essential in the treatment, we have a powerful auxiliary in a remedy which acts on the muscular tissue—belladonna. The pupil being maintained fully dilated by its aid, the value of which we only thoroughly recognize by a minute anatomical examination of the structures implicated, success of the happiest and most complete kind crowns our efforts; perfect vision is at once the brilliant antithesis of total blindness, and the desired result of skilfully directed knowledge.

We might almost repeat the above remarks in speaking of valvular disease of the heart, a masterly exposition of the proper methods and value of treatment in which, is given by Dr. Latham, in his *Clinical Lectures*, in a mode that must be familiar to all professional readers.

So with enlargement of the spleen in ague, with such affections as croup and diphtheria, which, though often fatal, yet are to a great extent in their early stages, and to some extent even in their later stages, under our control. In these

instances we can, at least, see that we are in the right path ; but there are many others where the light we possess to guide is of the feeblest kind, and these appear to be chiefly in the blood diseases. What, for example, is our knowledge of the deadly remittents of Africa and of the West India Isles ; what of plague, of cholera, what even of pyæmia, the too frequent consequence of many operations ?

We cannot but admit that in the last few years, during which continually increasing attention has been paid to pathology, many minor improvements have been made in various departments of surgery, as well as of medicine, consisting for the most part in closely following the operations of nature in her happiest efforts. These improvements collectively assume such consequence that we have thought them worthy of a brief *résumé*.

The importance of preventing the access of air to a cut surface has, it appears to us, been only fully recognised during a comparatively short period. Yet isolated examples of what would now be called subcutaneous surgery are met with in the ancient operation of depression of cataract as performed by the Greeks, and in such operations as that for the relief of hernia by Petit. Formerly (indeed, we believe the practice exists at the present day in some of the foreign hospitals), all open wounds were filled with scraped lint, or charpie, and allowed slowly to heal by granulation. It mattered not whether they were made by the clean instruments of the surgeon, or were lacerated, or contused in their character, the treatment was the same. When the great tedium and loss of time by this method were recognised by the medical man, as they had long been by the patient, the next step made in advance was in the immediate closure of clean incised wounds, the abolition of poultices, and the substitution for these last of simple water dressing. This change was in great measure due, in England, to its advocacy by Mr Liston, the success of whose practice was so great that the plan, simple, natural, and cleanly as it was, rapidly spread through the country.

But stitches of silk and plaster were still often used, and their presence setting up much irritation, prevented union in their immediate neighbourhood, and it often occurred that, in removing the plaster, the tender and newly-formed adhesions were torn asunder. Yet more recently, the introduction of the metallic suture, the use of a fine and perfectly smooth silver wire instead of silk, which possesses the advantage of setting up little or no irritation in the tissues through which it passes, has been followed by marked benefit. There was yet one point of difficulty and annoyance. The ligatures with which, in any large operation, the various arteries were tied, these forming in many instances a thick bundle, still kept the edges of the wound apart and retarded recovery. Even this difficulty has, however, been surmounted by the inge-

nity of Dr. Simpson, who has suggested that hæmorrhage from arteries, even of the largest size, may be controlled by pressure upon the vessels, made by thrusting a long needle through the textures. By these several means we appear to have reached at length the ultimatum of success in the treatment of simple incised wounds. There is now no irritating substance whatever between the lips of the wound, there is nothing, consequently, to hinder, if the constitution be healthy, union by the first intention; and we accordingly find that large wounds, such as those produced by the removal of the breast in females, of a large tumour, or even by the amputation of a limb, may be completely healed in a few days.

There can be no doubt of the immense advantage which attends the performance of operations of whatever kind subcutaneously. The brilliant success of such operations has been well stated in an oration by Mr. Adams, read before the Medical Society of London in 1857, and he has collected a very large number of instances in which the principles of subcutaneous surgery are carried out. Thus, besides the ordinary operations for club-foot and for strabismus, which are now almost uniformly performed subcutaneously, he mentions Sir B. Brodie's plan of division of varicose veins beneath the skin, the opening of bursa, and of many abscesses, especially of those which occur in scrofulous children, of buboes, as recommended by Mr. Milton, and the operation for the radical cure of hernia. In all these instances the knife is small. It is introduced through sound skin; and the wound, which is necessarily minute, is carefully closed with a small wad, kept applied by a light bandage. Ill consequences are almost unknown, and the healing of the divided textures progresses with wonderful rapidity, and is accomplished by the development of cells, which form a fibrous connecting tissue. The good results of this plan are so generally recognised, that it may be said with truth to be uniformly adopted whenever the case will admit of it. This, then, may be considered as one of the most important, because one of the most generally applicable improvements of modern surgery.

The now generally adopted treatment of fractures may be considered as another improvement of modern surgery. Time was, when the unfortunate man who had fractured his arm or leg suffered severely at the hands of his medical attendant, and some of the plans suggested are so entirely opposed to the spirit of modern surgery, that we can only feel surprise at the conservative power of nature, which out of means so imperfect, could yet produce favourable results.

In a book scarcely yet out of date, written by a retired naval officer, who refers with pride to the capital results of his treatment in numerous instances, it is stringently ruled that the

man with a fractured thigh should be allowed to rest in an easy position for a week before any attempt be made to help him, and that *then* the limb should be extended, and be packed, *secundum artem*, in splints, that is to say, exactly at the period when, according to modern research, nature is rousing herself to activity in the formation of new bone, the parts, by handling and twisting, are to be reduced to their original condition at the time of the accident. The simplicity of the modern apparatus for the treatment of fracture is specially worthy of remark. Straight splints, a swing fracture-box for fractures of the leg, and occasionally a double inclined plane for fractures of the thigh, with a few bandages, are almost all that are required, and in many cases even these, simple as they are, are superseded by the application of the plaster of Paris or white of egg bandage. The use of these enables the patient to move about much earlier, by ensuring accurate coaptation, and does away with the long and tedious confinement which was formerly thought necessary. The simplest plan of treatment we have ever heard of for any fracture is that described by the late Mr. Vincent in cases of fractured clavicle, which he proposes to treat by simple position, and, from our own experience, we can most cordially recommend it, the patient being placed upon a hard mattress upon his back, so that the weight of the shoulders may open the chest and bring the fractured ends into position. If the patient can maintain this position for three weeks, sufficient union will have occurred to enable him to get up, only taking the precaution to keep the arm in a sling, that it may not be involuntarily used.

It may almost be said that the principles of subcutaneous surgery are brought into practice in the treatment of cases of compound fracture. Here the surgeon hastens to reduce the bone, if protruding, to close and heal the wound in the soft parts, to convert the injury, as far as possible, to the conditions of a simple fracture; and though, of course, in accidents of such serious import as these failure often occurs, yet sufficient encouragement is given by their occasional recovery to indicate to us that we are following the dictates of nature. At all events we are sure of this, that more instances of this kind recover now than would have been the case in the early part of this century, when the general character of surgical proceedings was of a more meddlesome nature, and when the restorative powers of life were less confidently relied on.

No single discovery in the science of medicine ever led to such important results as the application of chloroform for the prevention and relief of pain. That various substances have been used for these purposes at periods long antecedent to our era is well known. Operations of a painful nature were long ago performed

under the influence of wine, of the extract of hemp, and of the juice of some of the Solanaceæ. The inhalation of various gases was suggested towards the close of the last century; those employed, however, were found to be inefficient in practice, and their use was soon abandoned. In 1846 an American surgeon, Morton, used the vapour of ether for the purpose of producing insensibility, with success, and in a few months it was everywhere tried. Its disagreeable odour, the violent cough produced by it, and the occurrence of one or two fatal accidents, led chemists to turn their attention to other volatile fluids. The employment of chloroform we owe to the sagacity, and it may also be said to the courage, of Dr. J. Y. Simpson, of Edinburgh, who, after a long series of experiments, fortunately chanced to meet, in chloroform, with a substance of equal anæsthetic value to ether, and far more pleasant in operation; and although occasionally serious results have followed its use, these have generally been traceable to neglect of proper precautions; and, on the whole, in practised hands, it may be said to be perfectly safe.

Still more recently the application of freezing mixtures has been suggested, to parts that are painful or which are about to be operated on. In some cases, great advantage results from this local or topical application of a benumbing agent; but it is only in comparatively few instances that it can be adopted.

Chloroform, undoubtedly, is the means which, more than any other, has enabled the surgeons of the present day to advance to so extraordinary a degree in the path of conservative surgery, and nowhere is this more conspicuous than in the treatment of diseased joints. Whilst the patient is insensible, the surgeon can ascertain the amount of motion retained by the joint; he can determine in some measure the extent of the disease; he can introduce probes; he may even make exploratory incisions; and if he find that the cartilage or extremities of the bone are alone affected, he can quietly and without interruption proceed to the removal of the articulating surfaces. He need not be an old man who can recall instances where limbs have been (what we should now call) fairly sacrificed to these painful and protracted diseases; instances which, if they now fell into the hands of a good surgeon, would certainly be operated upon for resection. In many of these cases the movements of the hand and fingers, or of the ankle joints, have been perfect. Yet, because some old standing inflammation or ulceration of the elbow or knee joints existed, the arm or thigh has over and over again been amputated, leaving only a useless stump. Now, by freely laying open the joint, and the removal of two small fragments (a daring yet singularly successful operation) a hand and foot have often been left, which to the outward eye differed not at all, and to the patient himself but little from the opposite and

healthy limb. In some of the admirably successful cases of Mr. Jones, of Jersey, which we have had an opportunity of seeing, no lameness at all was visible, when the patients wore high-heeled boots. It is curious that these operations, involving as they do long and deep incisions with much care upon the part of the operator, rarely require any vessels to be tied: upon the whole, their results appear to be superior to those of ordinary amputations.

In ophthalmic surgery the great achievement of the last few years has been the discovery of the ophthalmoscope. By its means many diseases, formerly classed together in a confused manner, under the general terms of "amaurosis" and "glaucoma," are now easily distinguished from one another, and, as a natural consequence, the treatment which was formerly comprised in a few very general rules, is now directed to definite objects, and is far more successful. As in most other discoveries, the principle has long been known; its application has alone been wanting. The principle may be shown simply in this way,—when we look into a dark cellar at the farther end of which some animal, as a cat, is gazing directly at us, their eyes assume a singular glaring or illuminated appearance. It is due to the reflection from the bottom of their eyes of the light entering at the door behind us. If we are situated obliquely, as regards the animal, or if it is looking aside, no illumination is seen; the reflected light is stopped by the margin of the iris. In examining the human eye, therefore, it is necessary that the light should be thrown into it from the same point as that from which we are looking. This is accomplished by a small concave mirror having a minute hole in the middle through which the observer looks; a lamp is placed behind the patient; a ray of light can thus be easily thrown directly into his eye. A convex lens of about two inches focus is found to be essential to the thorough investigation of the bottom of the eye. Many cases, the nature of which would formerly have been exceedingly obscure can now be determined with the utmost certainty; thus, incipient cataract, detachment of portions of pigment, haziness of the vitreous humour, congestion or anæmia of the retinal vessels, and atrophy of the choroid or deposit of lymph upon its surface, are all affections the nature of which can be very satisfactorily ascertained by ophthalmoscopic investigation, and many can be materially benefitted by treatment. Even glaucoma, so long a stumbling-block to the ophthalmic surgeon, bids fair to yield to the long and patient investigation to which it has been subjected. By the older surgeons it was regarded as almost hopeless. Lawrence recommends purgatives, bleeding, and mercurials. The elder Guthrie used to apply a leech every night for a month to the temple. Then, paracentesis, or tapping, was tried; but all these plans fell into disuse. At length Gräfe, drawing his conclusions partly from

anatomical and pathological facts, and partly from symptoms disclosed by the ophthalmoscope, as cupping of the optic nerve, enlargement and change of form and pulsation in the retinal vessels, suggested an operation which has now been frequently tried with varying success; but which is probably, with some slight modifications, destined to hold a high place amongst the curative measures to be employed for this insidious and destructive disease. His operation consists essentially in the removal of a portion of the iris.

Mr. Hancock, taking another view of the pathology of glaucoma, has recommended another operation which has been repeated with immaterial modifications by Nurreley and Solomon—namely, the division of the ciliary muscle, the good effects of which in some of the cases we have seen and operated on have been indubitable; but the whole subject is still too fresh for any positive statement to be made. The treatment of another series of affections of the eye has materially improved of late years. In purulent ophthalmia, formerly, the most severe anti-inflammatory treatment, both local and general, was employed, and but too often with unfavourable results; now, the patients are supported, good food, wine, and quinine are given instead of abstinence and bloodletting, and the eyes kept clean by emollient, or but slightly stimulant lotions, instead of being burnt with caustics, and, rapid as the progress of the disease often is, good vision is very generally preserved.

Such are a few of the chief improvements in modern surgery; many more might be added were our space not limited. Much of this general advance is no doubt due to men who, possessing wide knowledge in every department of professional information, have devoted their whole energies to the cultivation of some particular branch. It is to such devotion that we owe many of our best works—such works as *Brodie on the Joints*, *Lawrence on Hernia*, and *Mackenzie on the Diseases of the Eye*; but we do, in common with the authors of the *Protest against Special Hospitals*, which has been recently extensively circulated, most strongly deprecate the limitation of the younger members of the profession to the pursuit of some particular form of disease, merely to gain a name, their general information on other branches being weak and imperfect.

In a handicraft trade, subdivision of labour commonly implies improvement in the manufacture of each part; but in knowledge it is not so. The wider the grasp, the stronger the powers of the intellect; by so much the more easily will it handle any subject presented to it for the first time. Complete knowledge of a profession is essential to the prosecution with advantage of any special part. A man who shall engage in the practice of one disease without a competent knowledge of the nature and causes of disease in

general, will almost certainly fall into a routine plan of treatment; he will be unable to see the bearings upon broad questions, which oftentimes the most trivial facts possess, and, on the other hand, will almost as certainly be unable to perceive how the progressive knowledge of other departments is associated with, and intimately related to, the advance of his own particular branch. We would make it a rule that every surgeon to a special hospital should also be a surgeon or assistant-surgeon to a general hospital.

Coincident with the progress of general and scientific knowledge has been the advancement of surgery. During the last hundred, we might almost say during the last fifty years, more real improvements have been made than during the five hundred which preceded them. The theory of the art has been made more exact, its practice more perfect; the objects to be attained have been more clearly perceived—the means of accomplishing them more thoroughly understood. Instead of being the master, the surgeon is content that his art should be the handmaid of nature; he is willing in most cases to follow in her footsteps, content if occasionally he may interpose to direct or modify the processes of reparation which she ever strives to establish.

ART. VII.—THE DEFORMED AND THEIR MENTAL CHARACTERISTICS.

FAIR forms and mental excellence, do they go together? Are we what our bodies make us? Does the mind answer to the shape of our heads, spines, and limbs? Are the profiles of Cicero or Marcus Aurelius, such as they are represented in the sculptures of the Campidoglio at Rome, emblematic of the talents and virtues so eloquently expressed in the histories of their lives and writings? Or, is the wonderful repose carved on the features of the First Napoleon, the sublime ideal of Austerlitz or St. Helena, Waterloo or Marengo? The chief charm in the countenance of Byron is the poetic fire that beams from his eye and forehead, for the rest of his face is not formed upon the best of models. Byron imagined that there was a strong resemblance between himself and Marcus Aurelius; and, perhaps, at first sight the resemblance is striking; but the nose, mouth, and chin of Aurelius are indicative of the highest moral perfection, whereas those of Byron betray the grossest sensuality.

Thersites is described by Homer as the ugliest man that came to Troy, and Ulysses says he had never met with a more disa-

greeable creature. He was squint-eyed, or, as Buttman translates it, bandy, with one leg shorter than the other. His head was peaked and partially bald, or scattered over with thin hair. He had a squeaking voice, a spiteful temper, and a saucy mode of speech. His spine was gibbous between the shoulders. The noblest in the camp were the butt of his cynical impertinence, and he was withal a coward. Ulysses struck him with his staff, and Agamemnon upbraided him in public, without effect.*

This accurate description is the earliest we have of diseased spine. It is earlier than that of Hippocrates by five centuries at least. The physiological as well as the psychological characters of the *Iliad* are touched with the hand of a master. The account that Helen gives to Priam, in the third book, is unrivalled as a piece of graphic writing. The scene passes before you, and each person, as he is mentioned, lives, moves, and speaks with the air and manners proper to himself. The fierce Ajax has broad shoulders and a strongly-built frame. Ulysses is short with an expansive chest and a grave deportment; Menelaus is fair-haired and mild in temper; Agamemnon, tall, athletic, and graceful; Achilles, long-legged; and Hector distinguished by his handsome countenance, sparkling eyes, and exact muscular proportions.† The prettiest man among them is Nireus, who, singularly enough, is, like the ugly Thersites, a great coward.‡

The dwarf, if not a hump-back, is a ricket with the chief characteristics of spinal disease. People of diminutive, as well as of gigantic proportions, are seldom more sound in mind than they are in body. Their temper is malicious or stupid, cruel or weak; and their passions are ungovernable and brutal, or they have no passion at all. The salacity of the dwarf is only too well known. Ariosto makes use of this propensity to point one of his stories with the epigrammatic humour so peculiarly his own. The tale turns upon a fair lady, the wife of a handsome Italian, choosing as her paramour a graceless humpback, who treats her as his mistress with disdain, and serves her base passion with the coolest effrontery. If like goes to like, the lady must have been as deformed in taste as the dwarf in person, with whom she took her pastime.§

To which of the two shall we award the meed of merit in power of speech and fancy—to blind Melesegenes, thence Homer called, or to the incomparable Ariosto? Which fatigues us the soonest, the ancient or the mediæval bard? Perhaps, no one can decide but those who have seen the south of France, the land of Orlando Furioso, or the broad Hellespont and the shores of Troy. In

* *Il.* ii. 211. Butt. *Lex.* p. 541.

† *Il.* iii. 216.

‡ *Il.* ii. 671.

§ *Orlando Furioso*, Canto xxviii.

point of good taste and fineness of execution, the Greek excels the Italian poet; but the extravaganzas of Ariosto are too good to part with, and the wild fire of his genius never blazes in vain.

The idea of eccentricity of character being allied to eccentricity of form has not escaped the shrewd mind of Sir Walter Scott. In the *Lay of the Last Minstrel*, the elfin page is introduced with a vivacity and precision which leads us to believe that Sir Walter had some living being of the same description in his eye:—

“ Little he ate, and less he spoke,
Nor mingled with the menial folk;
And oft apart his arms he tost,
And often muttered, Lost, lost, lost !
He was waspish, arch, and litherlie,
But well Lord Cranstoun served he ;
And of his service was full fain,
For once he had been ta'en and slain,
And it had not been for his ministry.
All between home and hermitage
Talk'd of Lord Cranstoun's goblin page.”

Canto ii., 32.

In private practice, it is not unusual to meet with patients like Scott's elfin page, or Ariosto's dwarf. Sometimes it runs in families, particularly in those where marriages have been contracted between kith and kin. Account for it as we may, such connexions are productive of monstrosities, simpletons, or dwarfs. One of the children, a son or daughter, absorbs all the intelligence and strength of the rest. Of the remainder, one is too tall, another too short, a third bow-legged, and a fourth nothing more than a stunted nonentity. Spinal disease, consumption, or insanity is their common property. The medical attendant is seldom absent from their door. As they grow up, the boys become profligates or incapables, who are eventually laid aside by the world and left to shift for themselves. They end by becoming wearisome dependents on their betters, or sink into sots supported upon a pittance doled out to them weekly by some unseen hand. As to the girls, if they marry, they quickly fall into interminable ill-health, and help to fill up that dreary catalogue of ovarian and uterine maladies, of which they hope to be cured at last so long as their husbands have a fee to spare. Their minds suffer with their bodies. Their nervous fancies are real. They are never free from pain. Their home is their hospital, and domestic comfort is at an end. When their means are large, a long life is spent in the pursuit of health and in the gratification of an egotism which amounts to mental aberration.

Many of these cases are met with in children who have sprung

from a late marriage or a drunken father. The wine or spirit drinker engenders an ill-health which is singularly visible in his offspring. The puny child, or dwarfish adult, comes of this source. The pale and beardless face that meets us in the busy streets is the unmistakeable evidence of his parentage. Even dogs may be dwarfed by dosing them with alcohol. The functions are arrested and development is stopped. The bony structure suffers the most, although, very likely, the brain and spinal cord take the lead in the course of defective organization.

Misery, mental and bodily, is entailed on the first, second, or third generations, when the breed ceases, if it have not already become extinct in the first. Convulsions and palsy carry off not a few. The rickety live the longest, albeit, they fill up their place in the world with pain and sorrow, a vexation to themselves and a care to all around them. Hence it comes to pass that deformed persons are proverbially disagreeable and perverse, for they cannot keep pace with their companions, while it is impossible for them to live apart, and destitution to lag behind.

In the character of Richard III. all these qualities are well portrayed, as he descants upon his own deformity. It evidently had the worst effect upon the whole of his life. He was not formed to amble in a lady's chamber; the dogs barked at him in the streets; and the sight of his own shadow in the sun irritates him to the last degree of virulence. He feels that the world scouts him as an ill-begotten thing, and he vows revenge upon the world in return. He had the opportunity and the power of doing so, and he wreaks his vengeance even to his own cost. The cruel sarcasms he vents against himself, and the stinging consciousness he betrays of his imbecility as a man, remind us of the petulance with which Lord Byron resented the slightest allusion to his club-foot, or shrunk with morbid sensitiveness from the glance of a stranger casually looking towards the spot upon which he was standing. The bodily uneasiness finds a poor relief in uttering sharp sayings and bitter invectives, which create enemies at every word, or make the careless laugh and good men sigh.

It was out of this class that the royal jesters and buffoons used to be selected. They were looked upon with a degree of wonder amounting almost to superstition; and, were it not for the barbarity and ignorance of the age in which they were fostered about the courts of princes and nobles, we might be tempted to regard the custom of retaining them as a dull satire on the favourites of kings.

Hippocrates has already described these pitiable cripples ages ago. Their long backs, short legs, and long arms; their small hands, narrow chests, protuberant larynx, shrill voices, and poking heads, were signs that did not escape his notice. He

says, if they are fleshy and plump, they live to be old; but if they are lean, they die early, generally at or before sixty.

The reader will remember the Black Dwarf in the Waverley Novels. Pliny in his *Natural History* tells us* that the celebrated historian, Tacitus, had a brother who was a perfect monstrosity. In three years he grew six feet and nine inches—in tria cubita triennio adolevisse. He was able to walk, but in a slow heavy pace, and was dull of apprehension almost to stupidity. He died of sudden spasms, and violent contractions of the nervous system. No likeness of Tacitus himself has come down to us. But if he was like his model Emperor, Vespasian, he had, according to numismatic authority, a vast head, a long back, short legs, and small arms—unmistakeable signs of rachitis, whether they be found in the person of a victorious Roman Emperor, or in that of his not less highly talented admirer, the author of the history of his times, and the acute annalist of his age and manners. Vespasian's head was most remarkable for its prodigious size, and argued a character greatly above or below mediocrity. His talents were entirely of a military kind. He was certainly superstitious, for he cured a deaf man and a paralytic by his imperial touch.† But his sense of the fine arts was dull, since he forgot himself, and fell asleep in the presence of Nero, as that despot was reciting his own verses to the sound of his lute. For this dire offence, Vespasian ran the risk of forfeiting his life, except, adds Tacitus, that his superior genius or destiny reserved him for the conquest of Judæa.‡

Large trunks with short legs are mostly significant of gross dispositions, and, if the head be large, of a relentless and determined character. In *Gil Blas*, the Prime Minister of the King of Spain is described as a deformity of this sort. The portrait comprises too many particulars for it to be otherwise than original. He was a tall man, much above the common size, and he would have been thought fat, even among the corpulent. He was so high-shouldered that he looked like a humpback, although this was not the case; and his head was so large, that it was thrown forwards, and rested on his chest. His hair was black and straight, his visage long, his complexion sallow, his lips compressed, and his chin pointed and projecting. "This was certainly not the figure of a refined gentleman," says *Gil Blas*, "but he was agreeable enough whenever he pleased, and just the reverse whenever it served his interests, or suited his fancy, to be so. A libertine, an autocrat, and an intriguer, he at last came to ruin."§

* Pliny, *Nat. Hist.*, Lib. vii. 12.

† *Tacit. Hist.*, iv. 81. Statim conversa ad usum manus, ac cæco reluxit dies.

‡ *Tacit. Annal.*, xvi. 5.

§ *Gil Blas*, Livre xi. c. 4.

There is a medium size, above or below which *safe* talents are rarely found; and there is also a *safe* complexion, blended of the ruddy, black, and brown. The most energetic persons are of the brown temperament, and those of great action and discernment usually have aquiline noses. Julius Cæsar's was a small slender figure, with a long neck and a round but not a very large head. Nelson and Napoleon were both small men, and the great Duke of Wellington was not large. St. Athanasius was so small, that a young lady shut him up in her wardrobe, and saved him from the emissaries of Constantius, who were in hot pursuit after him throughout Alexandria.* Levi, the Publican, known as St. Matthew, was a very little man; which accounts for his climbing up the sycamore-tree to see what was passing. St. Thomas, the Apostle, has given his name to streets in some of the capitals of Europe, on account of his diminutive stature, as that of *Little St. Thomas Apostle* in the City of London. St. Augustine was also small, and so was his mother Monica, if we may trust the traditional effigies of them both, which we have seen in the crypt of the magnificent cathedral at Bourges, Central France. Æsop was small and humpbacked; and so was that crooked little thing that asked questions, Pope the poet. And Alexander the Great had a wry neck. The great Apostle St. Paul was, if we may trust the Byzantine historian Nicephorus,† crooked and slightly stooping, small in stature, and of a contracted figure, of a fair complexion, bald, and prematurely old.

The incentive in Byron, says Moore, was that mark of deformity on his person, by an acute sense of which he was stung into the ambition of being great.‡

“Deformity is daring.

It is its essence to o’ertake mankind
By heart and soul, and make itself equal—
Ay, the superior of the rest. There is
A spur in its halt movements, to become
All that others cannot, in such things
As still are free to both, to compensate
For stepdame Nature’s avarice at first.”

Deformed Transformed.

Adopting the sentence of the mighty Byron, we may conclude with the words of Lord Bacon, which the poet apparently had in his mind when he penned the foregoing lines:—“That whosoever has anything fixed in his person that doth induce contempt, has also a perpetual spur in himself to rescue and deliver himself from scorn; therefore all deformed persons are extremely bold.”§

One of the most able, if not the most highly favoured, of

* Gibbon, xxi.

† Nicephorus, Lib. ii. c. 37.

‡ Moore's *Life of Byron*, p. 306. Murray, 1860.

§ Bacon's *Essay*, iv.

Louis XIV.'s marshals, was a sickly humpback, the Duke of Luxembourg.

"He had," says Lord Macaulay,* "a huge pointed hump on his back, and was not only very ugly, but very diminutive also. His constitution was of the feeblest kind, and he was at once a valetudinarian and a voluptuary. His morals were none of the purest. He had great qualities, a rare judgment, and a singular presence of mind. Indeed, his sickly and distorted body seemed to derive health and vigour from disaster and dismay. At the battle of Steinkirke, where he was manifestly taken by surprise, the victory was entirely owing to the coolness and intrepidity with which he faced the critical conjuncture, and restored the order of battle."

Many more instances might be quoted—but enough ; so severe a disease cannot but inflict a lasting impression on the sufferer. It may be a good, but it is more often an evil impression, that spreads its influence far and wide. The census of 1851 enumerates 409,207 cases of deformity for England and Wales, and of these 90,277 resided in London. The returns from the manufacturing districts speak of distorted spines as all but universal. Nor is the complaint limited to those who are deprived of the comforts of life, for it is just as frequent among the more affluent classes. Infirmary of mind and inaptitude to the common offices of life, and undeveloped puberty in both sexes, are constantly reported. Few, if any of them are fit for the army. Out of 613 recruits, only 238 were approved for service ; the rest were rejected as not strong enough to serve in the defence of their country.†

It is the same in France as in England. At Orleans the number of deformities met with is marvellous. Whole families of bandy-legged and humpbacked may be seen walking along the streets of that sunny town. The cathedral on Sundays is thronged with them ; they intermarry, and thus propagate the disease. While sitting in the boulevards at Périgueux, the chief town of Périgord, in 1858, three humpbacks passed us in as many minutes. Dwarfs, humpbacks, and squint-eyed abound in the Pyrenees. The Spanish peasantry that cross the border are small and contemptible. The finest figures are those of the Basques women, who may be seen at Bayonne, Bagnères de Bigorre, and various parts of the Basses Pyrénées, carrying pitchers of water on their heads, and tripping along as upright as a dart. Our very kind hostess at the *Hotel du Parc* at pretty little Dijon, was herself a humpback.

The evil, however, is not a modern one. Hippocrates could

* Macaulay, vol. iv. p. 277.

† *A Letter to the Working Classes, &c.* By H. Drummond, M.P. London, 1859. Bosworth and Harrison.

never have described it so accurately had it not been common in his days. The cause of it is a deep question, which would require a treatise by itself, although it is not difficult to divine it. Our object, however, in this article has been to show its mental peculiarities and psychological bearing, and to bring before the profession and the public the consideration of a question which concerns the domestic, the political, and the sanitary condition of the population in the highest degree.

ART. VIII.—ON THE STRUCTURE OF THE INDUCTIVE SYLLOGISM AND ITS CORRELATION TO THE DEDUCTIVE.

By R. G. LATHAM, M.D., F.R.S., &c.

IN the present paper the structure of the Inductive Syllogism will be investigated, the details of which will be considered from two points of view. They will, of course, be treated as what they are in themselves; but this will scarcely form the main part of the inquiry. The main part of the inquiry, if it were not for an extract which will soon be given, would lie in the relation they bear to the syllogism of the ordinary moods and figures; this relation being a correlation. As it is, however, it will consist of something else.

Let two series of facts not only give a correlation, but let that correlation be distinctly recognised by the first systematic expositors of the science upon which they bear, and the result will be a certain amount of harmony and symmetry in the terms which such expositors either adopt or invent. This is because the correlation itself is one of the phenomena to which they will have to attend. Let the correlation, however, be overlooked, and the language will be adapted to the subject-matter under notice alone; its relations to anything else being ignored. This has been the case with the ordinary syllogism. Its terms were framed with a view to itself only.

Now the main object of the present paper is to correct this exclusiveness, and to modify the language of the text-books to the extent required for the full exhibition of the correlation in question.

The Deductive Syllogism begins with a proposition like

All men are mortal,

No. II.

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and having, *secundum artem*, added the word *Socrates*, concludes with

Socrates is mortal,

descending from the larger, to the smaller, class.

The Inductive Syllogism, on the other hand, begins with

Socrates is mortal ;

and having, *secundum artem*, added *men*, concludes with

All men are mortal.

In this we begin with the smaller, and end with the larger, class. If so, the extremes are the same, not only in their elements, but in the arrangement of them, though they differ widely in the place that they take in the syllogism. The major premiss of the one is the conclusion of the other, and *vice versâ*. How, then, is this brought about? That depends upon the form of the intermediate proposition; which is, in the first case, *Socrates is comprehended in the class man*: in the second, *the whole class man, in respect to its mortality, is adequately represented by Socrates*.

All this is neither more nor less than what has been better said by Sir William Hamilton already; the following extract—the one alluded to above—being from his article *Logic* in reference to the recent English Treatises on that Science. (*Edinburgh Review*, April, 1833). Reprinted (1852) in his *Discussions on Philosophy*, &c.; see pp. 156—165.

“Not only is the Deductive thus, in a general way, dependent for its possibility on the Inductive Syllogism; the former is, what has not been observed, in principle and detail; in whole and in part—in end and in means—in perfection and in imperfection, precisely a counterpart or inversion of the latter.

“The Inductive inference is equally independent, and though far less complex, equally as worthy of analysis as the Deductive. It is governed by its own laws, and if judged aright, must be estimated by its own standard. The correlation of the two processes is best exemplified by employing the same symbols in our ascent through an Inductive, and our re-descent through a Deductive Syllogism.

Inductive.

X, Y, Z, are A.

X, Y, Z, are (whole) B.

Therefore B is A.

Deductive.

B is A.

X, Y, Z, are (under) B.

Therefore X, Y, Z, are A.

or—

A contains X, Y, Z.
X, Y, Z constitute B.
Therefore, A contains B.

or—

A contains B.
B contains X, Y, Z.
Therefore A contains X, Y, Z.

These two syllogisms exhibit, each in its kind, the one natural and perfect figure. This will be at once admitted of the Deductive, which is in the first figure. But the Inductive, estimated, as it has always been, by the standard of the Deductive, will appear a monster. It appears, on that standard, only in the third figure, and then, contrary to the rule of that figure, it has an universal conclusion. But when we look less partially and more profoundly into the matter, our conclusion will be very different.

“In the *first* place, we find that the two syllogisms present so systematic a relation of contrast and similarity, that the perfection of the one being admitted, we are analogically led to presume the perfection of the other.

“In the *propositions*, the order of the terms remains unchanged; but the order of the propositions themselves is reversed; the conclusion of the one syllogism forming the major premiss of the other.

“Of the *terms*, the major is common to both; but (as noticed by Aristotle), the middle term of the one is the minor of the other. In the common minor premiss, the terms, though identical, have, with the different nature of the process, changed their relation in thought. In the Inductive, the parts being conceived as constituting the whole, are the determining notion; whereas, in the Deductive, the parts being conceived as contained under the whole, are the determined.”

That this (*inter alia*) gives the correlation in question, with full and proper clearness, is evident; and it may also be added, that the remarks by which it is preceded give the difference between the Logic of the Inductive Syllogism (the special object of the present paper), and Induction in the ordinary, but somewhat catachrestic, sense of the term, in a manner which few would attempt to improve upon.

Let us address ourselves, then, to what stands over—viz., the question as to how far the present language, which was framed to suit the exigencies of the Deductive Syllogism alone, requires modification when the Inductive Syllogism, with its correlation, comes within the field of our inquiry. Let us get such harmony and symmetry as can be obtained at a moderate amount of innovation.

At present we have got a transposition, and something else. We have also got three subjects *without* signs; and we have also got the statement that the Inductive Syllogism is “far less complex” than the Deductive. But we have no exposition of the

grounds upon which this difference of complexity rests, nor (what is more important) any evidence to show that it exists at all. In fact, it does *not* exist. So far as the ordinary syllogism is deductive, each and all of its complexities have their counterparts in the inductive. It is only, however, *in part* that the ordinary syllogism is either deductive or inductive at all; so that the identification of it, in its common form, with deduction—to the exclusion of aught else—is exceptionable; and equally exceptionable is the comparison of the few syllogisms which are truly inductive, with syllogisms in general. These last are partly deductive and partly something else; the deductive portion alone being that by the side of which the inductive should be placed by any one who would measure either the relative importance or the relative complexity of the two.

Let the ascent from the less to the more, and the descent from the more to the less, general be the essential characteristics of Inductive and Deductive inference, and let—

All men are mortal;
All men are rational;
Some rational beings are mortal;

be tested by this criterion. Where is the ascent and descent? Where is the more and less particular? Where the greater generality? Where, in short, is the subalternation of classes which in

All men are mortal;
All heroes are men;
All heroes are mortal;

gives us *mortal* as the name of a class more general than that of *men*, and *men* as the name of a class more general than of *heroes*; classes of which the greater, or major, contains the middle, whilst the middle, in *its* turn, contains the smaller, or minor. Here all the classes have a definite relation, as either great or less, to each other; and ascent or descent (one or both) can be effected throughout.

In—

All men are mortal;
All men are rational;
Some rational beings are mortal;

between two of the classes—the one expressed by *mortal*, and the one expressed by *rational*—there is no comparison of generality at all. For all that the syllogism tells us, *mortal* may be more general than *rational*, or *rational* more general than *mortal*. There is no way of measuring the two. Instead of one of them including the other as a class, they simply meet in a third. Each may be of

any magnitude; the only thing concerning them that we know, being this—they *may* be equal. They may be equal, inasmuch as there is no proven inequality. Of the class denoted by *man*, we know a little more. As it is the subject in each premiss, it cannot be greater, and may be less than its predicate.

If all this be true, the syllogisms of the third figure are *other than deductive*; so are those of the second. In—

No bad man is happy;
Some tyrants are happy;
Some tyrants are not bad men;

the two subjects of the premisses stand in the same relation to one another as stood the two predicates of the preceding syllogism. The class expressed by *tyrant* may be larger than that expressed by *bad men*, or it may be smaller; inasmuch as the syllogism never measures the one against the other. In practice it treats them as equal; no inequality being proven, or even suggested. Meanwhile of *happy*, as the name of a class, we know, *mutatis mutandis*, what we know of *men*. Mark the words *mutatis mutandis*. As the predicate in each premiss, it cannot be less, and may be greater, than its subject.

Like those, then, of the third, the syllogisms of the second figure are *other than deductive*.

With these limitations—limitations by which the deductive portion of the ordinary syllogism is restricted to the first figure—the difference in the amount of detail between the systems disappears. Induction is on a level with Deduction; Deduction being smaller than it is supposed to be.

Meanwhile the question of the *signs*, in which is involved that of the copula, calls for notice. That there are no signs to the predicates of the syllogisms of the extract has already been stated.

The ordinary copula is *is*, or *is not*; *are*, or *are not*. If, however, the substitution for it of such words as *contain*, *constitute*, *are under*, and *are (whole)*, is not thought to give too great a departure from the common form by a logician like Sir William Hamilton, it is not likely to be objected to by the world at large. The present writer would, perhaps, prefer *represent* (or *stand for*) to *constitute* and *are (whole)*; whilst, instead of *are under*, he would write *stand as*. He would also connect with it, *as far as n or m is concerned*—*n* or *m* being the predicate of the other premiss—whatever it may have been.

For the forthcoming observations Sir W. Hamilton's copulas may stand as they are; and upon these it must be remarked that *constitute* and *are whole* are not in the same category. They are not equally copular; or, if they are, they fail to strike us as such. Each contains a predicate element, but this predicate element is

far more conspicuous (or less latent) in the one than the other. In x, y, z are (whole) B , we have something very like x, y, z are all- B ; where *are* is a simple copula, and *all- B* a quantified predicate. That x, y, z constitute B , is really x, y, z are that which constitutes B , is true. But, as there is nothing which exhibits the sign *all*, the predicative element in this case obtrudes itself less.

Let the copular element of $x, y, z = B$ predominate, and the inversion that changes

All men are mortal;
Socrates is a man;
Socrates is mortal;

is—

Socrates is mortal;
All men are as Socrates;
All men are mortal;

the alteration consisting in a transposition of the extreme terms along with one of the predicate and subject of the middle one; the *sign* remaining as before—i.e., attached to the subject.

In this case the original Figure is preserved, and both the Deductive and the Inductive Syllogisms are in the First.

Not so, however, if the predicate element assert itself. When it does this,

Socrates is mortal;
Socrates stands for all men;
All men are mortal;

is the result. Here the syllogism is in the third figure, and a predicate is quantified. This means that the subject and the predicate of the middle proposition have been left as they were, the *sign* alone having changed its place.

In this way we get an Inductive Syllogism of the First Figure, and another in the Third; the first corresponding (*nearly*) with *Barbara*, the second (*nearly*) with *Datisi*.

Why do I say *nearly*? Let the typical form of the syllogism, whether Deductive or Inductive, be that wherein there is the *maximum* of ascent and descent—*ascent* from the less to the more, *descent* from the more to the less, general. In its typical form the Deductive Syllogism begins with a Universal, and ends with an Individual, affirmation. In its typical form the Inductive Syllogism begins with an Individual and ends with a Universal. *All men are mortal, and Socrates, being a member of the class man, is mortal*, says Deduction. *Socrates is mortal, and, as Socrates, in the matter of mortality, adequately represents mankind at large, all men are mortal*, says Induction. Each case, however, is extreme. What we say of the class *men* we say of

the whole of it: whilst *Socrates* is the name not only for a part of that class, but for the smallest part into which it can be divided.

The more general the one extreme, and the more particular the other, the more typical the syllogism; the most particular sort of particularity being that which is given by an individual. Replace *all* by *some*, and the Universality of our more general extreme is only approached approximatively. Instead of *Socrates*, write *Some philosophers*, and you have only an approach to the *maximum* of particularity.

But what if the typical syllogism as it has just been exhibited be typical only in the eyes of the unlearned? That *Socrates* is an individual their common sense tells them; which also tells them that an individual is the smallest, the most partial, or the most *particular*, part of the class to which he belongs. And their common sense is right. If *some philosopher* be a particular statement, *one philosopher* is more particular still. It is the part of a part. This is the view of the reader who knows nothing of Logic.

With the slightest tincture of Logic, however, he will think differently. He will know that, in the eyes of the logician, such a statement as *Socrates is a man* is treated, not as a particular proposition, but as a universal one. This is because *Socrates* means *All Socrates*.

It is not difficult to see how these two views may be reconciled. If we look upon an individual object with reference only to itself, it is a *whole*. If we look upon it as a member of a class, it is a *part*. A part of *Socrates* is an arm, a leg, or what not? something different in kind from *Socrates* himself. The parts of the class to which *Socrates* belongs are philosophers, Greeks, human beings, or the like, one of which is *Socrates*.

Socrates, then, is a whole or a part, according to the view that is taken of him; and, according as this view changes, he is, in the eyes of the logician, in such a proposition as

Socrates is a man,

a Universal subject or a Particular one.

Now it is absolutely necessary for the Inductive Syllogism that its *individuals* should be *particular and not universal*: in other words, its individuals must be looked upon with respect to their relations to the class which they represent, rather than with respect to what they are as wholes to their own constituent parts. We cannot, in Induction, make *Socrates* less particular, (*i.e.*, more universal) than *some philosophers*.

Here, then, is a point where a discord has to be got over. How? I draw attention to the fact that the ordinary practice of pre-

fixing to names other than individual (abstract names and certain approximations to them being considered as such) a sign in *both* premisses is unnecessary. For a particular affirmative, the only conditions are that *both* the premisses should be affirmative, and that *one* should be universal. In a syllogism with a universal conclusion *some* never enters at all. Meanwhile, *Darapti*, with its two universals, gives us neither more nor less than what is given us by *Disamis* and *Datisi* with only one. For this reason, a sign for a particular conclusion is needed in one premiss only, whilst it is wholly excluded from a universal one. This means that it is never needed in a second premiss at all, except, of course, so far as it may be required for the purposes of language. With or without it, the conclusion is the same. Such being the case, we are free to adapt our signs to the expression of this individuality—individuality rather than simple particularity—which characterizes the Inductive Syllogism.

When the connexion is copular rather than predicative, and the syllogism is in the first figure, no change of sign is required. When, however, it is predicative rather than copular—*i. e.*, when the predicate is quantified and the syllogism is in the third figure—we must individualize it. When the term is a proper name, it is already individual; and to this character of a proper name, or individual term, it must be approximated when it conveys the notion of either more objects than one, or a single object of which the identity is doubtful. Indeed, strictly speaking, such expressions as *Socrates is man*, *Socrates is mortal*, are not absolutely unexceptionable. How do we know that the *same* Socrates is meant?

Let the word *same* be used as a sign in one premiss, and (although it is not necessary to do so) let us say *certain* rather than *some* in the other. This is because in induction we have not only a definite number of objects which form the basis of our reasoning, but have them in the mind at once. When we argue from the individual we argue from *this* or *these*; *that* or *those*; *this*, *that* and *the other*; and our syllogism is—

This, that, and the other, are mortal;
The same stand for all men;
All men are mortal.

Or we may say—

Certain individuals are mortal;
The same stand for all men;
All men are mortal.

In this use of the word *same* there is nothing which good logicians have not allowed, as may be seen in Lambert's *Dianoilogie* amongst the older, and in Thompson's *Laws of*

Thought amongst the newer, works that treat of the syllogism. *Same*, though a sign, is scarcely a sign of *quantity*.

The individuality of the middle term and the figure of the syllogism are related. That there are inductions in the first figure has been seen—inductions wherein the correlation between the *ascensus* and *descensus* is at its *maximum* of clearness. Individual terms, however, are better handled as subjects than as predicates, and, for this reason, the Third Figure is generally considered as better adapted to the Inductive Syllogism than the First.

Why, however, does the Third Figure give a universal conclusion when the syllogism is inductive; whereas, when it is other than inductive, it only gives a particular one? The reason of this lies in the details of the conversion. As far as figure is concerned, it makes no difference whether, in such a syllogism as

All men are mortal;
All heroes are men;
All heroes are mortal;

we transpose the first and last propositions *in toto*, or merely transpose the terms of the second. In one case the result is

Heroes are mortal;
Heroes are men;
Men are mortal;

in the other

Men are mortal;
Men are heroes;
Heroes are mortal.

The Figure in each case is the Third. Not so, however, the signs. In the transposition of the *terms*, the transposition which gave us the ordinary syllogism of the third figure, the sign *all* was lost; inasmuch as

All men are mortal;

comes out, after conversion,

Mortals are (some) men.

In the transposition, however, of the *propositions*, the transposition which gave the Inductive Syllogism with its universal conclusion, the sign *all*, though lost in the subject, was preserved in the predicate.

ART. IX.—METANOIA.

A PLEA FOR THE INSANE.

By HENRY McCORMAC, M.D., Visiting Physician to the Belfast District Hospital for the Insane Poor, and Consulting Physician to the Belfast General Hospital.

THE soul is beset, or liable to be beset, by different influences, which raise or depress while they occupy it, from the highest to the lowest level, from perfect sanity of heart and mind to perfect insanity, and from perfect goodness, and purity, and truth, to the utterest impurity and untruthfulness. The souls of the insane, however deranged, perverted, or destroyed, are governed by the same laws as the souls of the sane. If we do not understand the psychology of health, we shall never understand the psychology of disease. For there is no exact line of severment between sanity and insanity. There are perhaps as many mutations in insane as in sane life. Yet the insane man is not entirely insane, nor is the sane man always entirely sane. It is the preponderance, in amount and degree, of insanity over sanity that constitutes disease.

The insane man perceives, but his perceptions are distorted, imperfect, confused. His attention, and also, his association of ideas, are similarly characterized by disorder and decay. Yet are they demonstrative of eternal laws, divine realities, subsistent in every breast. As in dreaming, somnambulism, delirium, reason's rule has ceased, the laws of the succession of thought or suggestion still prove operative, but all strict control is at an end.

Corporeal disease, nerve deficiency, may lead to insanity, and are often associated with insanity, oftener still with idiocy, but corporeal disease is not insanity. It is not true that in the morbid states of thought, which we term insanity, a change in the material organization is necessarily involved, and simply, because thought is not the product of organization. Disordered sensation, hallucination also, which is a form of disordered sensation, may lead to insanity, but, as in the famous instance of Pascal, may subsist quite apart. The brain, neither the white part nor the grey, is not mind, does not discharge any one mental function, is of no intellectual capacity or potentiality whatever. So far as mind is concerned, the brain is simply a large ganglion, and associated with the spinal marrow or nerves, generally, a congeries of organs for the generation and propagation of nerve-force, the vehicle of impressions from the sense-organs, and of

conveying to those organs the soul's volitions. It is just as reasonable to ascribe consciousness to brain fibre as it would be to ascribe consciousness to a turnip or a stone.

We may assume, if we like, that life precedes consciousness. Doubtless, however, the mental, plus the bodily consciousness, is generated together. Outward objects, as we know them, and, irrespective of the outward factor, which, the soul's receptivity being assumed, generates them, are but forms of the soul's consciousness. There is a concrete ego. The extended living frame, indeed all nature, as we know it, subsists in the consciousness. But the living frame, from its ceaseless contiguity, differing thus from other outward objects, is continually present as an objective consciousness. A subjective consciousness, indeed, ends in self, whereas the objective consciousness assumes an outward factor, conterminous with, and inclusive of the sentient nerves. Whosoever does not admit the foregoing, does not admit the first elements, the A B C of psychology. The soul-mind, then, and the body-mind, so to speak, as respects the plane of consciousness, are one. But the different states of the object-mind precede and give rise, in the first instance, to the different states of the subject-mind itself, which then gains the capacity of thus continuing and propagating itself, in consciousness, for ever.

Thus, then, there is, there can be, no conscious existence or subsistence out of the plane of the conscious mind itself, and consequently, the notion that insanity is merely a cerebral disease, a disorder of the delicate vesicular neurine, or nerve-substance, is only fit for that limbo to which a Milton consigns things shapeless, fantastic, unreal. The whole hypothesis is at issue with the deliverances of consciousness as a truth-organ. Now, the entire formation of character, of all individuality, in the sane as in the insane, resides in fixity of impression. It is God's law as impressed on nature and the soul of man, and is alike true, whether in regard of sensation, emotion, or thought. Without fixity of impression one man would not differ from another man, nay, would not be himself from one interval of time to another. Fixity of impression, in its degree, is a thing so important, so all-essential, that nature, by which I would understand the provident working of God, has employed every desirable, and indeed possible means to realize it. Without fixity of impression there could be no education, no training, because there would be no real, at least no lasting receptivity. There would be no science nor art, nor any genius or skill. So, then, congruous with the laws of consciousness, it is fixity of impression, the appliances being conformable, that characterizes, indeed creates, sanity in the sane, and in the insane insanity.

The antithesis of fixity of impression is mutability of impression. Without mutability, in its degree, fixity would be useless, without fixity mutability would be similarly useless. There must be a healthy mutability, a healthy fixity, neither in excess, neither unduly deficient. There may be an insane mutability as well as an insane fixity, a sane fixity, a sane mutability. The healthy soul includes both healthily.

It must not be supposed that all insane persons become insane in the sense of lapsing from sanity into insanity. There is such a thing as an insane development, being insane, because in strictness there never was perfect sanity. The paucity, the sparseness of intelligence which multitudes of insane persons display, idiocy in all its grades, weak-mindedness in all its grades, can be explained on no other principle. Here, then, the faculties are few in number, the intelligence is limited. The faculties are poorly, and not only poorly but insanelly exercised. Of the many forms of insanity, and insanity is indeed various, this of undeveloped, ill-developed intelligence, is perhaps the most difficult to deal with.

For the most part insanity is of slow growth. Many insane persons remain long years unchanged, do not become better, neither do they grow worse. On the other hand, while some regain their normal intelligence, others lapse into utter imbecility. If serious bodily disorder, if paralysis, local or general, if epilepsy coexist, the tendency, other things being equal, is evil. I do not find a lightening up or restoration of the intelligence before death. In fact, I do not remember an instance of it among the insane persons whom I have seen dying or about to die. They die in general as they have lived, insane.

Idiocy or dementia subsists from birth, or it may supervene. In the former case, the nerve-structure, though deficient, may be otherwise healthy. When there is deficiency in the nerve-apparatus, the great ganglion which we term the brain, the functions dependent on this apparatus will be deficient, the organs of relation will be at fault. But this nerve-deficiency may ensue later in life, owing to cerebral structural disease. It may arise also from sudden and violent shocks, fright, terror, surprise. At other times the faculties languish, vegetate, and decay, concurrently with general prostration and decay, but apart from any appreciable nervous organic change.

Insanity, unless when early removed, tends to chronicity, and may subsist for years. And yet, even when removed, it may, and often does recur. Anything that turns the attention, that incites to wholesome instead of unwholesome thought, to control, instead of want of control, to sound in place of morbid will, is of service. And thus it is, other circumstances proving favourable,

that the prospect of recovery is so much greater among strangers than among friends, abroad than at home. Persons otherwise insane, on being visited by friends or strangers, will often place such constraint on themselves as to seem, and indeed for the time to be, quite sane. The will, in effect, is the man, and if we can but healthily control it, we have the Open Sesame which happily is to conduct us into the treasure-house of reason itself. If the return from insanity to sanity, as I firmly believe and maintain, be realized by the culture of the will, it sets aside, as irreconcilable with fact and with truth, the doctrine that the one and only genetic source of insanity is organic, structural, cerebral change.

Delirium differs from insanity in that it has a corporeal origin, as evidenced in febrile disorders, during inflammation, the accidents of parturition, hysteria, and as owing to loss of blood. In the crises of excessive excitement, violent passion, epidemics of fanaticism, deranging body and soul, the mental functions are perturbed to that degree that insanity itself is a not unfrequent result. In the delirium induced by toxic drinks, *i.e.*, strong drinks in toxic doses, the abuse of narcotics, the nerves, both at the centre and the periphery, are subjected to false impressions. Hallucination from disordered nerve-function, as I have said, may subsist in insanity, is even capable of inducing it. But, as noted instances prove, the case of the Berlin bookseller Nicolai, for example, hallucination may co-exist with otherwise perfect mental health. Irregular nerve-function, irregular reflex-function, leading occasionally to delirium and madness, may be seen in somnambulism, ecstasy, and the states induced by what in America is named Spiritualism. Insanity from terror, bereavement, shocks of surprise, may, and does ensue without appreciable structural change, and, along with instances of ordinary chronic insanity, contradict and set aside the notion of the exclusive corporeal origin of psychical derangement.

If, then, we discard this error as to the cerebral origin of insanity, we must as a corollary dismiss likewise the equally erroneous doctrine of hereditary insanity. But the condition of brain or of nerve-fibre, productive, as asserted, of insanity, it will be said is hereditary. Yes, but thought is not a nerve-function at all, does not depend on phosphorus, as modern empirics have it, is not of molecular origin, whether in the sane or the insane, consequently insanity is not thus, cannot be, hereditary. It would be strange indeed if insane people had not sometimes insane offspring, since we find it so even with the sane. Doubtless the mischievous influence of imitation, example, of moral infection, so to speak, will do its work, but then this is not the hereditary

influence contended for. I do not mean to say that impairment of nerve-structure may not be derived, as numberless instances of congenital idiocy from hereditary influences prove. But the deficiency of nerve-action which arises from deficient nerve-structure is quite a distinct thing from the mental derangement which may, and does ensue, without any cerebral deficiency, structural or functional, whatever. For the nerve-structures discharge the functions of organs of relation and innervation, and have nothing to do with thought, which is not a nerve-function at all. The doctrine of hereditary insanity is a mischievous error, fraught, like all the other fruits of our ignorance and misconception, with evil and bale.

The mortality during insanity varies, but is at all times considerable. For the health suffers from detention, gloom, cells ill-ventilated, mental strife, constraint, coupled with the ills incident to our common humanity. The insane rally but indifferently from attacks of disease, whether chronic or acute. Little co-operation is too often to be expected from them even in respect of the best concerted measures for their relief. If we assume the total number of lunatics, idiots, and demented persons in Britain, Ireland, and their dependencies as 50,000, and if we further assume the annual mortality as 10 per cent., we find that the accession of insane persons needful to maintain this amount is about 5000 every year. Such are the disastrous results, not indeed of hereditary influence or organic disease, so much as of defective training, weakened self-restraint, utter neglect.

Everything connected with a healthy will, very especially the faculties of perception and sustained attention, is excessively impaired in the insane. This necessarily follows from the weakening and impairment of the faculty of self-control itself, so needful to the exercise of healthy thought. The power of attention differs in the insane, as it differs in the sanely-minded themselves, but is lessened in all. Few things indeed are more remarkable in contemplating the insane than the indifference which they manifest under circumstances which arrest the attention of persons in sane life.

There is one thing which, as it seems to me, lies at the root of the whole question of insanity, its pathogenesis and treatment alike. I mean the manner of the consciousness in the insane. This is a matter of vastly greater moment than are any considerations relative to real or fancied mutations in what some are pleased to term the vesicular neurine of the brain, the plus, or the minus, real or fancied, of nerve-phosphorus. *Ohne Phosphor kein gedanke*, exclaims the German materialist. Insanity is disease of the brain-structure, repeats his English brother. It is not so. Phosphorus in sufficient abundance, with a sound

molecular structure, is needful and desirable, but brain-soundness and mind-soundness are not one thing, but different things. The brain may be diseased, its structure impaired, without mind-unsoundness. The brain may be most healthy, yet the mental faculties, as regards this terrene life, fled for ever. No, the evil lies quite other than in empirical considerations, resides in the mind's unconsciousness of its consciousness, in a word, the soul's unawareness of its own acts. If in the sane the mind's processes be not objects of attention, unless by a special effort, how much more so then in the insane. During insanity the mind is not conscious of its own consciousness. And herein lies the grand distinction between man and the inferior animals, between sleeping man and waking man, in fine, between man as insane and man as self-conscious. I do not assert that the insane are unconscious, but that they are not conscious of their consciousness, that they do not think on what they are thinking. If they did, and did so healthily, they would cease to be insane. The question of questions in reference to insanity and in respect of the impairment of the principle of volition lies here. I do not say that the man who does not reflect on the processes of his consciousness is insane, but I would assert that the man in insanity does not, indeed, so long as he is insane, cannot do so, and that here lies the point of his disease. The *γνώθι σεαυτόν* of the ancients, I am persuaded, refers to this, and not merely to the moral consciousness. In short, the insane man does not know himself, and therefore is he insane.

All science, psychology with the rest, consists of a series of approximations to truth. Science never jars with science. There is then no quarrel between physiology and psychology, rightly understood. Each is admirable in its own place. Nay, the phenomena which come within the province of each throw light upon the other, conversely and conversely. But when physiology alone attempts to explain questions that come within the exclusive domain of psychology, what can ensue but error and misconstruction? The questions of criminality and responsibility in insanity, hitherto so obscure, are easily enough resolved, on paper at least, so long as we are careful to keep psychology and physiology in their proper places. If the criminal be conscious of his consciousness, if he be able to reason, combine, in a word, to survey the operations of his inner self, unquestionably he is not insane. But the criminal lunatic, unconscious of his consciousness, and but partially conscious of his acts, is irresponsible because insane. Here, however, there are degrees, for self-consciousness and reason ebb and flow, so that a man may be comparatively sane, therefore responsible at one time, comparatively insane, and therefore irresponsible at another.

Of a surety the bodily health must be looked to in insanity, phosphorus must be furnished, but in copious food-supplies, disordered cerebral action, when it subsists, set aside. But even here, moral treatment is the essential thing. If disease indeed be urgent, if the nerve-structure be lesed, and its function seriously impaired, the man must die. Yet, short of this, the potentiality of recuperation, of self-integration, if I may coin an expression, never wholly intermits, and moral influences come ceaselessly into play. Substitution is the great agent for reclaiming the insane. This, is the moral lever, the mighty engine which is to raise the ruined soul, supplying such allurements as lie within our reach, till at length the principles of self-control and self-assertion being roused, the soul, its nobler powers awakened, gazing face to face on self, is rescued again. Yes, the fixed idea, the revolving circlet of insanity, must be rooted out, not by force or stress of argument, but through a species of gentle yet resistless constraint, until, the work being consummated, the soul become conscious of its better self. Spiritual health, that is what is needed, that is what we must substitute for folly, disease, and, when it subsists, crime. For God has imparted to every man, being cultivated, the divine power of introspection, the faculty of being, doing, thinking well, in a word, of remaining sane. There must be a surcease of all raving, random, circular thought, the soul must be led to higher perceptions, a more purposeful exercise of thought, and man through the providence of man made whole. For insane associations propagate themselves, and therefore must sane associations, at whatever cost of toil and pains, be made to replace them. Use must take the place of disuse in respect of every faculty. The moral decay that neglect and want of care have entailed, must give way to better types of thought and feeling. The will must be disciplined until perfect freedom, the freedom that consists in discharging the divine purpose, reign within. For each successful effort lends fresh powers, self-control breeds self-control, and glorious reason, celestial ray, is at last redeemed.

In nothing are the humaner tendencies of the age more conspicuous than in the general treatment of the insane. Establishments, conductors, as contrasted with former days, vie with each other in avoiding undue restraint, the solace of moral, the mitigation of physical suffering. It must be conceded, however, that the treatment is still too passive, that enough is not yet done to remedy psychical disease. Habitual skill, a practised humanity, will always more or less directly realize their aim, but the best treatment must repose on just views as to the nature of disease. No, insanity does not reside in the absence of phosphorus, the alteration of cerebral tissue, but in the aggravation

to extremity of the inanities, follies, crazes, shortcomings of daily life. If a preconceived and most erroneous hypothesis did not blind the judgment, it would be admitted that lunatics at any time might be seen in the enjoyment of perfect bodily health, and without the slightest trace of nervous derangement or cerebral disease whatever. The most successful, and therefore the most rational treatment of lunacy, must involve right views as to its nature and origin. To look upon the malady as material only, is to fly in the face of all observation, all just induction and analysis. As the causes of insanity are moral causes mainly, so must the treatment, the insanity regarded, be a moral treatment mainly. I would rather witness the treatment, the moral treatment of insanity, by a practical, experienced, intelligent non-medical person, than by a medical man entertaining, and only influenced by, materialistic views. For what possible weight can moral treatment, I mean a sufficient moral treatment, have in the eyes of one with whom derangement is a mere psychical question of plus or minus phosphorus, the more or less diseased modification of the molecules of the brain?

The great intelligence and humanity of very many of those who have to do with the treatment considered, I do not think that those who undertake the difficult task of dealing with the insane are afforded sufficient scope. For every means should be wielded calculated to remedy psychical derangement, in short, to reform and integrate, when disordered, the nobler machinery of the soul. More attractive bodily occupation there should be, for one thing, at one time beneath the free heaven, at another in some cheerful, roomy, well-ventilated space indoors. A higher class of persons, better educated, better remunerated, should be entrusted with the immediate culture, so to speak, of the insane. Such would prove susceptible of a far more elevated order of motives than the common herd of keepers and keeperesses, and would correspondingly bring such motives into influential operation in dealing with the insane. Indeed, the latter should be held to constant wholesome occupation of body and soul as free from violence and physical constraint. For it is difficult to imagine the extreme torpor of mind and body into which so many of the insane are plunged. Yet even they, for the most part, might be reached through the medium of their animal wants, various food and clothing, and occupation and recreation, some innocent lingering addiction, which it would be the business of the skilled attendant to discover. To music's gentle solace very many are accessible, and why not, since the musical faculty itself is not insane? When we come to the higher motives furnished by religion, science, letters, art, we find that many are immediately susceptible, and others prospectively so.

For they all help to turn attention from the mental craze, aid our attempts, in individual after individual, to induce sequential effort, the exercise of a more healthy will. Idleness, inoccupation, and gloom are indeed the bane of asylums, where moral culture should come more fully into play. And since the affections and feelings are not necessarily degraded, not even insane, there is in them a perfect mine of moral influence for thoughtful loving intelligence to turn to account when it will. For let us reflect that of the mind in itself we know nothing, know it only in its manifestations, which in the insane are at fault. It is our business, then, to remedy impaired morbid thought, to avert mental ruin, in short, if we can, to rehabilitate into healthy life and action the weakened consciousness of man.

If insanity can be removed, if idiots even, in whom the organs of relation are so deficient, for here lies their entire disease, can be raised to comparative intelligence, elevation, and happiness, with what vastly greater certainty might both these deplorable degradations of humanity be abated. It were indeed a noble problem for the legislator, the moralist, the physician, the divine, to stay altogether these dreary efflorescences of our partial civilization, our false refinement, our imperfectly-cultivated reasoning powers, our neglected youth, our excesses. The realization of a superior social status, of proper habits, would go far to stay the ravages of idiocy and insanity for ever. For God imparts to man the power of self-conservancy, of maintaining a whole soul. To him has that great Being confided the gift of self-control, and through self-discipline, of guarding against insanity and idiocy, of realizing success, and purpose, and wit, and strength of healthy will. Few, if any, grow instantly insane. There is many a rally ere the shattered faculties become clouded, impaired, lost. The purposeless will does not all at once forswear its dominancy, but once having lost the mastery is with difficulty restored. For if reason vacate its seat, how is folly to regain it? If indeed we take into account the so frequent weakness and inanity of daily life, we shall only feel surprise that the vacillating will does not yet oftener forsake its throne. Were the great principle of self-control incultivable, insanity could not be prevented, neither could it be removed. For the key to the successful treatment of insanity, and of all tendency thereto, is the substitution of sound for unsound thought, the culture of the God-like faculty of self-control. Any lapse of self-discipline, of self-culture, lessens by so much the practicability, impairs by so much the faculty of self-culture itself. If, in truth, we forego the exercise of our powers, if we forfeit the control which God has confided to us, the more enfeebled do those powers become, the less fitted for healthy life and effort. Lapse breeds lapse, and failure failure, until at length we prove incapable

of self-guidance, and come entirely to depend on the providence of our fellows. The insane man sinks into childishness, or a condition approximate, and, like the child, needs firm and succouring care. Mental imbecility, psychical disorder, acknowledge no other source than nature's violated laws. For God requires of us the fulfilment of his purposes, the realization of every obligation; in short, the carrying out of the compact which is entered into with us at our birth. He has gifted us with two worlds, one material, the other immaterial, one somatic, the other psychical, for our heritage. These worlds has he given us, worlds subjected to unerring law, that we should cultivate them and make use of them, and through our conduct beautify them, with, indeed, the dread alternative, in the event of failure, of being stricken with incapacity, and unable to comply with his divinest will.

ART. X.—SPECIAL HOSPITALS.

THE active war declared last year by the supporters of General Hospitals against the further spread of Specialism and Special Hospitals, seems to have degenerated into a chronic scuffle, mainly kept alive by the committee appointed to inquire into the question by the last General Meeting of the British Medical Association. Of the long array of names that followed the leading of Sir B. Brodie in the famous protest, not one seems inclined to pursue the matter further. We are not surprised at this, inasmuch as professional men are always found to be wonderfully gregarious, under the leadership of great names, in opposing innovations of any kind. They will fight under the standard of authority; but, in such combinations of men, not many will be found to step out of the ranks in order to do battle on their own account. Probably the Sir B. Brodie protest has since been discovered to leak most woefully. A very large number of those who signed it, and thus thought to wash their hands of the unclean thing Specialism, have been discovered to possess a weakness towards pet specialities of their own, but which, of course, they think as veritable exceptions to the general rule, as ophthalmic hospitals, so specially and unaccountably withdrawn from the general censure by our great chief himself. In short, there appears to have been a very prevalent idea among them that theirs are the only doxys free from heterodoxy. Standing, as we do, between the combatants, and having no special relations with either, we may be allowed to examine the matter philosophically. Is this Specialism a natural growth of our civilization,

or is it merely the offspring of self-seeking? We cannot help thinking that the springs of the movement are to be sought in both directions. If Specialism is an unadulterated evil, we may be permitted to ask how the long recognised distinction between physician and surgeon ever came to be permitted? Why are we not all general practitioners, as they are in country districts? The answer is clear enough. The profession simply adapts itself to the conditions in which it is placed: in the country, a medical man must be able to turn his hand to every want of the profession if he would live. In the ordinary run of cases, the general practitioner is quite up to his work; but in all cases of special difficulty, he is the first himself to seek the advice of the special man in the neighbouring city. In lesions of the chest, he sends for Dr. J. C. Williams; for a difficulty in the eye, Dr. Beaumont is summoned; for a critical operation, Mr. Ferguson's services are required, and so on. The general practitioner, every day of his life, pays this compliment to Specialism. It cannot, therefore, with any justice, be urged that Specialism is *per se* indefensible.

Robinson Crusoe was obliged to turn a cabinet-maker, agriculturist, boat-builder, stock-breeder, &c.; but when he was rescued from his island, he would most indubitably have bought a suit of broadcloth of the tailor instead of trying his hand again at goatskins. We cannot ignore the fact that, in all professions or trades, division of labour is being carried to an astounding extent. In the army, we find the three arms of the service having duties, and holding interests totally distinct from each other. The profession of law branches off into special pleaders, conveyancers, equity draughtsmen, and many other shades of forensic Specialism. In the engineering ranks how diverse are the paths trodden by gentlemen all originally educated for the same general profession. It is simply absurd to say that medicine is to be an exception to this general and very necessary tendency. The study of the diseases of the human body is a much wider one than that of either law or arms: the human intellect is not capable of minutely examining every detail of this inexhaustible subject; and, therefore, if we would really be proficient, and follow nature with subtlety and success, we must limit the field of our vision. Granted, replies the advocate of Generalism; but this is a question of degree, Specialism has gone far enough. When the chimney-sweep in *Pickwick* demands to be shaved, the barber magnificently waves him off with the reply, "We must draw the line somewhere—we stops at bakers!" Sir Benjamin Brodie draws the line at ophthalmic hospitals; but it is scarcely necessary to state, Specialism will decline to be shaved so far and no farther, even by the authority of the greatest name. It may suit the purpose of those practising Specialities, made orthodox by custom, to pooh pooh the introduction of new ones, and to denominate

them as innovations, but they cannot do so with any shadow of reason, and they know they cannot. In speaking of Specialism, we have of course taken it for granted, that if it is good, Special Hospitals must also be good. The reason why a Specialist is a better practitioner in his particular line than a General practitioner, is simply because he has greater experience than the latter. He sees a thousand cases where the other sees only ten ; consequently his powers of discrimination are enhanced, and he is far more likely to get at the general law of the case than the practitioner who is obliged to diagnose from cases few and far between. The congregation of like cases in a hospital gives an immense teaching power to the lecturer, which students know well enough. If a man wishes to study orthopædic surgery, he does not go to St. Bartholomew's, or Guy's, but to the Orthopædic Hospital ; again, if wishing to work at the eye, he prefers the Ophthalmic Hospital to King's College. These Special Hospitals are equally instructive to teacher and pupil : to the former it affords manipulative dexterity (sharpened to the highest point by being directed upon a limited object), as well as diagnostic power of a very high order ; to the latter, the fullest possible view of the subject under study in every aspect. And can it be denied that medicine itself will be a great gainer by this division of labour ? It is admitted on all hands that what has been wanted towards evolving trustworthy laws of disease, is a comprehensive and exact system of medical statistics. At present we dogmatize upon a few hundred cases, and those not viewed side by side as they would be in a Special Hospital, but picked out of the confused heap of cases that are passed in review in a General Hospital, these cases extending over so long a period of time that minute accuracy of comparison between their different distinctive features is quite out of the question. We have no hesitation in saying that medical statistics, or the "numerical method," as Dr. Guy terms it in his admirable lecture, will never be built up from the records of our General Hospitals as at present conducted, and we are equally certain that Special Hospitals will afford us this new aid towards a more correct view of disease. Is it reasonable, we ask, that classification should be adopted in every other scientific inquiry, but denied to medicine ?

But, says the advocate for the established order of things, if our great hospitals are to be broken up into petty institutions, what is to become of our schools ?—how will all the students be able to find time or money to go the round of a score of institutions for the treatment of all the ills that flesh is heir to ? This is a very pertinent question, and one requiring a satisfactory answer. We confess we do not wish to see the study of disease, which should be one grand unity, frittered away in detail. We have no desire to find the

human economy treated like the mechanism of a watch, in the study of which one man confines himself to wheels, another to balance springs, and a third to mainsprings, whilst each artisan is ignorant of the handiwork of his neighbour. If Special Hospitals lead to this result, we would say, Away with them; if the teachers in them could only give sketches of disease, which the student would have afterwards to put together with more than the neatness of a Chinese puzzle, if the effect of one disease upon another were thus lost to his comprehension, we should cast in our vote with the General Hospital memorialists. But Specialism has never contemplated such a state of things. Every Specialist receives his general education before he branches off to some limited line of practice.

In the Royal Academy the student must first become versed in general principles, and attain accuracy of eye and hand. These preliminaries mastered, he is free to take up miniature, landscape, or historical painting. If the teachers in our great schools cannot, under existing circumstances, ground the student in the general principles of medicine so as to afford a firm foundation from which he may direct his studies in any special direction, the fault is theirs. It is urged, we know, that the spread of Special Hospitals drains the General Hospital of its best cases, and thus reduces the teaching power of our great schools. That there is a tendency in this direction we most readily admit, but we must also observe that the inefficiency of the General Hospitals has brought on this state of things. Why have their supporters not seen that classification of disease must take place sooner or later either inside or outside of their walls? With the example of the magnificent hospitals of Vienna before their eyes, in which we find special diseases treated in special wards, why have they allowed "outsiders" to take up the running, and to establish these special wards as Special Hospitals? If we examine the plan on which all modern Lunatic Asylums are built, we find classification carried to the utmost limit. Why should classification, found to be so useful in mental diseases, not be tried also in bodily diseases? The answer is, that asylums are generally of modern construction and under Government control, whilst hospitals are in too many cases under a system of government which desires no change, no departure from the old routine, which manufactures medical officers on the same principle that machine-made bricks are now constructed—the one behind pushing the one before forward, and forcing him out a ready-made brick (or officer) exactly according to pattern. The consequence of this system of rotation, a thousand times more inexorable than that obtaining in the army, is that good and true men, who have proved their quality, if "unattached," can find no place, and are forced to establish a field for their exertions in

Special Hospitals. Can we wonder that Brown-Séquard has thus been forced to found a hospital for epileptics? Is it a wonder that Marshall Hall contemplated a similar institution, in consequence of having no hospital appointment in which he could exercise his undoubted genius? We think, then, we have traced the establishment and rapid spread of Special Hospitals to two sources: 1, The spread of civilization, which inevitably leads to classification and the division of labour; 2, The inefficiency and the cliquism of the General Hospitals. These two causes, operating in the same direction, have brought on a revolution which conservative medicine beholds in full career, and vainly seeks to stop with an empty and hypocritical protest.

ART. XI.—HONORARIA.

THERE is a highly pleasing idealism in the conception of an honorarium which should at all times be carefully cherished. On the other hand, so great an amplitude of realism enters into our notions of one that the least excursive mind rests gratefully upon the subject. In fact, abstractedly considered, an honorarium offers matter for much and profound reflection; while of the concrete question—alas! “’tis the general humour of the world; commodity steers our affections throughout.”

If the subject be regarded from a philosophical aspect, we learn, as well from history as from observation, that the mind has not failed to deal with it as with every other question into which an ideal and a real element justly enters. As the thoughts have oscillated towards one or the other phase of the question, this has been invested now with a preponderance of idealism, now of realism; while scepticism and mysticism have not failed still further to discompose the vexed reason with their perturbing influence.

The differential character of an honorarium consists in its ideal element. Upon the right conception of this fact hinge the whole of the vexed questions connected with honoraria. We *pay* our servants or our tradespeople; we give an *honorarium* to our advocate or physician. In trade we render an accurately calculated return in money or substance for value received; in a profession the benefit rendered cannot be submitted to the ordinary rules of valuation, and a gift is of necessity substituted for a payment properly so called. In merchandise the *quid pro quo* is the same for the pauper as the millionaire; in professional

service it varies partly according to the wealth of the receiver, partly according to the reputation of the giver, and for a like benefit the honorarium may be simply a grateful "thank you" (as is often, very often, the case), or a hundred or more guineas (as is very rarely the case).

The mental expenditure of a physician in any given case, is the essential thing of value which he yields to his patient. But in what manner could we arrive at a just estimate of the worth of this, so that the individual benefited by it could return due and fitting compensation for that benefit? The shrewdest business talent recoils perforce from the solution of this question, and our estimate of the equivalent to be rendered for professional aid must of necessity be based on very different and altogether secondary, but far from unimportant grounds. Thus, the gravity of the case attended, the time devoted to the care of the patient, and the reputation of the physician—all these things must enter into our consideration in endeavouring to calculate the importance of the service rendered. Hence it is that strictly speaking, the physician can never be paid an equivalent for the aid he renders; and in recognising and acting upon this truth, and renouncing voluntarily the right to demand legally any remuneration, does *honour* to himself; and the patient, acting upon the same truth, and presenting such a gift as his means afford, also does *honour* to himself; and such a gift is most properly termed an *honorarium*.

Now, sundry physicians entertain so lofty an idea of their science, that they will neither ask for a fee, however justly it may be due, nor specify the amount of one if asked so to do. Their souls revolt from the barest notion of anything that may have the semblance of trading out their talents in the ordinary forms of barter. "The physician who exclaims 'Give! Give!' when a sufferer cries 'Oh! Oh!' is worthy only to be a hangman or headsman." So said Theodore Zuinger, of Basil, and it is asserted that he would not even take a fee from the rich, except when forced upon him. "Madame," quoth a living and highly talented practitioner to a lady when, after a long and harassing attendance upon her daughter, she had asked him to state what she was indebted to him,— "Madame, I cannot make a charge." "Sir," she rejoined, "I am not so wealthy that I can give you a fee proportionate to my own estimate of the service you have rendered to my daughter, I must, therefore, at least beg of you to give me some idea of the amount of remuneration I ought to tender to you." "Madame," he said, "I should regret to offend you, but I cannot degrade my profession to the level of a trade. Whatever fee you think fit to give me I shall receive with satisfaction." "Sir,"

was the reply, "I cannot enter into any discussion with you upon questions of professional etiquette or honour. I am loth to wound your feelings, but it is impossible for me to look upon this matter otherwise than as one of simple business, in which I am prepared to pay what you conceive will be a just remuneration for such trouble as you have been at on my account, so far as that trouble admits of being remunerated. For the rest I can only offer you my gratitude." The practitioner smiled and bowed. It was evident that such a commonplace view of the matter would neither ruffle his feelings nor cause his principles to deviate in the slightest degree from their beaten track. Many months, indeed, passed before he was induced to give the lady any help in solving the difficulty, when a satisfactory honorarium was given to him, and—the medical charge of the lady's family given to another, who looked upon honoraria from a less ideal point of view. "I could not retain longer the services of the former gentleman with due respect to myself," said the lady, "or with the prospect of much longer maintaining any respect for him."

There are other physicians who look upon their profession simply as a means of earning substance, and who, in a thoroughly mercantile spirit, seek by the practice of it to obtain as large a pecuniary profit out of their patients as practicable. With these men the honorarium is the end and object of their labour. They chiefly admire the precepts of John of Gaddesden, who was accustomed to urge the fitness of physicians making sure of their emolument before taking a case in hand; they mostly follow the practice of M. Dumoulin, who would have his fee whenever and however often he saw a case. If a patient asked, "Doctor, shall I see you again?"—"Yes," he would answer, "if you pay me." "Is it necessary that I should pay you immediately?" "Certainly, if you wish to see me again." These are the physicians who, as Mosca phrases it in *Volpone*, "flay a man, before they kill him." Dr. Johnson states of his friend Levett, that "he would swallow what he did not like, nay, what he knew would injure him, rather than go home with an idea that his skill had been exerted without recompense; and had his patients maliciously combined to reward him with meat and strong liquors, instead of money, he would either have burst, like the dragon in the Apocrypha, through repletion, or been scorched up, like Portia, by swallowing fire." Very recently the public has been edified and the profession somewhat astonished by a fact which transpired in the progress of a law-suit, to the effect that a medical practitioner had claimed fees amounting to upwards of nine hundred pounds for a three-months' attendance upon a case which was not, so far as could be learned from the evidence, of the most exacting character.

These illustrations will show the typical modes in which the idealism and realism of honoraria are manifested. Fortunately, however, for the welfare of medical men and the public, a well-founded scepticism steps in, and, for the most part, restrains the ideal element of the honorarium within bounds compatible with the rough requirements of every-day life; while a certain mysticism, represented by a happy and enduring faith that medical science has a somewhat loftier aim than one of mere personal aggrandizement, holds in check alike both the scepticism and the realism, preventing the former becoming the mere tool of the latter. The majority of medical men, indeed, temper their ideal conceptions of the nobility of their profession with a proper regard to the requirements of commonplace existence. Thus, while, on the one hand, they yield without stint their aid to the poor, neither seeking for or requiring any honorarium from them, other than the thanks of a grateful heart; on the other hand, they look for such guerdon from the wealthier classes as might be anticipated from a generous appreciation of the important services rendered during sickness.

We frankly confess, even at the risk of being charged with an extravagancy of idealism, that the pleasantest reminiscences of our own professional career (one, be it said in all humility, by no means lacking experience) are those connected with the simple but warm gratitude of the poorer and poorest classes,—those who had nothing to offer but thanks, and those who, having but little, strove to force that little upon you, and make it much with the warm out-pourings of a thankful heart.

Certainly, the most enviable fee that ever we received was a *smile* from one who, with barely a rag to cover her, was laid upon a heap of filthy straw, in a cellar. We were passing along a bye-street in one of our great manufacturing towns, at a time when fear of "*the Fever*" had gone abroad. Several women were standing upon the causeway, talking earnestly. As we came up to the group, one of the women stepped up to us, and, curtsying, said, "I ask your pardon, sir, but please are you a doctor?" "Yes, my good woman," we replied; "can we help you anyway?" "Well, sir," she answered, "there was a woman and three children ill of fever down in that cellar (and she pointed to a narrow flight of steps littered with filth and offal), and we have seen nothing of them for three days. One of the children, a little girl, was the last person we saw up the steps, and she had been for some physic to the workhouse. The parish doctor saw her mother and the other children three or four days ago, but he has not been since. Me and my neighbours don't know what to make of the matter, and we were talking of it when you came up." "Then have none of you," we said, "been down into the

cellar to see what was going on?" "O yes, sir," answered a woman, "I looked in a few moments ago, and saw that the mother and children were all very ill with the fever. But I dare not stay, for I have a young family, and so has each of my neighbours." And then came a chorus of requests that we should enter the cellar and help the poor woman and her children. "What has got her husband?" we asked, as we descended the flight of steps. "He has deserted her," was the reply; and we entered the cellar. About the centre of the floor, laid upon a heap of filthy straw, was a frightfully emaciated woman, who was in the very agony of death. The only clothing she had on was a ragged chemise; and over the lower part of the body was thrown a coarse cotton sheet, beneath which also were huddled two little children, clad only in shirts, and both helpless from fever. In a corner of the cellar, a girl of about twelve years of age sat upon a scanty layer of straw. She had a tattered frock on, but no other covering, and her bare feet rested upon the damp and mouldy floor. Moving her body restlessly backwards and forwards, and with her eyes fixed on vacancy, she, also fever-stricken, was muttering incoherently to herself, and every now and then she cried out in all the wild vehemence of delirium. A broken iron pot was the only article of furniture in the place. There was not a particle of food to be seen, and, alas! there were neither cupboards nor closets to hide either "bit or sup." It would have been hard to have said whether the children or mother were most wasted from fever or starvation, but the thoughts involuntarily dwelt upon the horrible possibility of the latter. As if in bitter mockery, a bottle of medicine, duly and neatly labelled, but of which the contents had been untouched, stood upon the window-sill. The window itself was beneath the level of the street, and rags and straw usurped the place of glass, but one or two unbroken panes remaining.

As we knelt down by the side of the dying woman, the two children thrust their heads from beneath the sheet, and, gazing at us with wild and startled looks, asked for food! A deathly film had settled upon the staring eyes of the mother; and before we spoke to her, we thought that she had already escaped far beyond the reach of any sensual impression. But when, bending over her, we uttered we know not what, in a few seconds a look of intelligence struggled back to the eyes. Presently they awoke up to a full consciousness, and an amazed look stole over the face. A moment more, the eyes met ours. We spoke again, and put gently back the tangled hair from the dying woman's clammy forehead. Then it was as if the whole soul rushed back for a moment to the wan face. A radiant smile, overflowing with joy and hope, lightened the eyes and spread over the coun-

tenance ; the lips slightly parted, as if they would have formed some words, but before a sound had passed between them, the light faded from the eyes, and the children were motherless. Even after death that glorious smile lingered upon the face—a smile which had winged the soul into the other world, and which had been begotten by a simple, kindly expression. Was ever doctor more richly rewarded for a mere act of duty ?

If the gratitude of poor patients could be placed to a doctor's credit at his banker's, medical millionaires would be by no means rare personages. Unfortunately, however, for the profession, as much cannot be said for the more substantial thanks of our richer patients. Money cannot be so readily dispensed as thanks, and when the latter have to be transformed into a pecuniary equivalent, they often suffer sorely in the change. It is very significant of the comparative rarity of generous guerdons to the physician, that the instances on record are few in number, are worn threadbare by frequent quotation, and that few examples can be added to the stock list. Indeed, the great incomes of a few physicians are made, not by the frequent receipt of honoraria of unusual magnitude, but by incessant labour, combined with the fact that the great reputation of these men enables them at all times to claim the highest fees permitted by custom. We read of Dr. Dimsdale receiving, in 1768, from the Emperor of Russia, for inoculating the Empress and her son, a fee of 12,000*l.*, a pension for life of 500*l.* per annum, and a title of nobility ; of the Emperor Joseph, of Austria, on his death-bed, making his physician Quarin a baron of the empire, and giving him an annual pension of 2000*l.* ; of Sir Astley Cooper, in one instance, receiving a fee of 1000*l.* ; of a provincial practitioner, since Sir Astley Cooper's time, receiving a fee of 2000*l.* ; and better still, of another provincial practitioner, who very lately has been enriched by the gratitude of a patient who possessed no relatives, with a comfortable estate worth about 700*l.* per annum. We learn these things with much the same feelings as we listen to the story of the rich guerdons bestowed on the Sage Douban, in the *Arabian Nights*. We read, however, of the large incomes made at sundry times by several medical men, with very different feelings. It is pleasant to learn that Sir Astley Cooper received annually for some time 15,000*l.*, and that one year his receipts amounted to no less than 23,000*l.* ; that Dr. Chambers's income reached nearly 9000*l.* per annum ; and that in one particular month he pocketed 1100*l.* in fees ; that Dr. Matthew Baillie one year received 11,000*l.* ; and that, to speak of some of the older physicians, Dr. Mead's income from practice amounted for several years to between 5000*l.* and 6000*l.* ; and Dr. Lettsom's receipts in one year reached 12,000*l.*

Dr. Fothergill's income, we may also add, averaged 6700*l.* during the last twenty-five years of his life. He, it is said, left a fortune of 80,000*l.*, yet he strove to banish "all thoughts," to use his own words, "of practising physic as a money-getting trade, with the same solicitude as he would the suggestions of vice or intemperance."

Pleasant as it may be to find that the practice of medicine does become in a few instances a very profitable pecuniary pursuit, it is by no means to be supposed that large incomes, such as we have quoted, represent, in any undue degree, generosity on the part of the public towards professors of the healing art. These incomes are the result of harassing and incessant labour of a character which the unprofessional individual cannot rightly apprehend or appreciate, and the pecuniary emolument simply represents the commercial value of the practitioner in the eyes of the public. In whatever manner we ourselves may stand upon the dignity of our profession and of honoraria, there is no doubt that the public, from whom we have to earn our livelihood, as a rule, look upon fees in the most tradesman-like fashion. In paying us, they take very great care that they will not give us more than our market value, and the income of a medical man is the index of that value with respect to the particular locality in which he resides. Although, therefore, at times a generous heart breaks through the conventionality of the established rules of payment, and is governed solely by the feelings in recompensing a medical attendant, this happens too rarely to have any permanent effect upon income derived from practice. And it is well that it should be so; for if the physician were to be dependent for his regular remuneration upon the feelings of the patient in every case, we fear he would fare badly. It must be evident that, as we have already indicated, the wide deviation of opinion which exists in the medical profession, on the proper character of the honorarium, could only lead to the utmost irregularity in practice. Add to this source of confusion those which must be found in the ordinary conception of the value and uses of money in a large mercantile community, among whom the prevalent aim will be to get whatever is required at the least cost, and it cannot be doubted that an endless clashing of opinion would be the consequence. But custom (in this case the resultant of the combined action of a commercial atmosphere and professional worldly aspirations) stepping in, has happily prevented so sad an ending by fixing a *Zero*, in the form of a guinea, to the honorarium scale. Thus the medical man, on the one hand, is enabled to escape being victimized by recalcitrant patients; and, on the other, the public have a steady criterion to guide them in estimating the remuneration which should be tendered to him.

The public, however, rarely does otherwise than treat the question in the most business-like fashion, tendering usually the *minimum* that can be demanded from it; and at times it has recourse to trade-tricks of the dirtiest description. A capital and common "dodge" is to wheedle the physician out of his advice in the street, or club, or at the dinner-table. It answers well, and is highly economical, to get him to spend a day at your country house, and incidentally consult him about all the ailing members of your family. The substitution of a present of plate or jewelry for fees is gone out of fashion, but when it might be had recourse to, the gift of a trumpery ring (in one instance worth about four sovereigns) served capitably for an attendance extending over a period of two or three months. A fashionable French physician once remarked that, at one period of his career, he had received several presents of plate from patients, when he was unable, from want of money, to pay the expenses of his carriage. It is a coarse but very effectual trick for a single consultation, to present shillings neatly wrapped up in paper in place of a guinea. We prefer, however, the bolder expedient of coolly consulting the physician and walking off without giving a fee at all. It is not a bad idea to obtain medical aid under a false character, trusting to the known kindness of medical men. Many a substantial personage has, in this manner, defrauded the physician of his fees. Mr. Jeafferson tells of a magistrate and deputy-lieutenant for his county, ingeniously obtaining in this way a three weeks' attendance from an eminent surgeon, without paying a fee. Very recently, a lieutenant in one of our infantry regiments became a subscriber to a London hospital, and subsequently called at the house of one of the physicians to the hospital under the impression that he had a right, derived from his subscription, to consult him without fee whenever he thought fit! Not long ago, also, a country gentleman of property, unwilling to pay his ordinary medical attendant a reasonable fee for the performance of a serious surgical operation, smuggled himself into a metropolitan hospital.

It is well always to bear in mind that, if a medical man accustoms himself to demand exorbitant fees, the public have the remedy in their own hands, and they are not backward in employing it. But the medical man is almost helpless against the impositions practised upon him. These impositions, however, are perhaps trifling annoyances compared with that want of just appreciation of the nature and value of the physician's services, which is far from being uncommon, and which, perhaps, gives rise to the most provoking annoyances connected with fees. There are few things more painful to a physician than that, after attendance upon a case, the ordinary honoraria should be begrudged; yet this is not rarely the case. From the trade of the apo-

thecary having been so long combined with the duties of a physician, in the practice of the medical men who constitute the greatest bulk of the profession, and have medical charge of by far the major portion of the population ; and from the fact that the general practitioner's remuneration has been usually sought, for many years, in the form of simple *trade* charges for medicines and mileage (the charge for medicine being made arbitrary, so that it might include a certain percentage for the intellectual element—advice), it has come to pass that the majority of individuals are accustomed to estimate the value of medical attendance by the quantity of medicine prescribed or taken. The intellectual and essential element of the physician's attendance has, indeed, been so little obtruded, that certain people have learned to look upon the "advice" as a secondary matter, and thus to regard as a grievance the being called upon to pay for it as the most important element of the treatment. This feeling, although chiefly found within the special sphere of the general practitioner, has not failed to extend its influence into all branches of medical practice. It is not a little interesting, therefore, and augurs well for the onward course of the profession as a whole, to note the change which is gradually coming over the whole system of charging among general practitioners. Moderate *fees*, so calculated as to include the cost of medicine when that is supplied, are being widely substituted for the older trade method of charging. We believe that this system has been found to work well even in practice among the poorer classes of people, due regard being given to their humble means. In proportion as the principles upon which remuneration is claimed approximate in the different branches of the profession, we may rest assured that the annoyances, arising from a wrong idea of the physician's duties, will decline, and that the whole status of the profession will rise in the eyes of the public. Whatever will tend to elevate the position of the general practitioner must powerfully contribute to this desirable end ; hence the great importance of the decision recently come to by the Royal College of Physicians, to admit general practitioners to certain rights and immunities of their College.

If, however, the medical profession would do justice to themselves in this question, it is above all things necessary that they should be true to themselves. There should be no want in each branch of the profession of a generous appreciation of the duties of the other branches. If the physician or surgeon (*pur sang*) conceives that he is at liberty, on sundry abstract notions of dignity, to treat the general practitioner with scant courtesy at the bed-side, it may be expected that from time to time such conduct will tell forcibly upon consulting fees, lowering them in a man-

ner not very gratifying to the receiver. It is well to reflect that the general practitioner is essentially the family medical attendant of this country. It is from him that families chiefly receive their notions of the nature of medical duties; it is to him they look for guidance in those circumstances in which it may be requisite to have recourse to a physician or surgeon. He is the chief adviser as to the importance of the services which may be rendered by a physician or surgeon, the value of the time which he may have given to the care of the patient, and the reputation he has acquired. To the general practitioner, also, the physician or surgeon, on his part, has mainly to look for such information as to the worldly status of the patient, which will enable him to form his own estimate of the fee which he ought to receive for the services he has given. Apart, therefore, from the consideration of those amenities which ought to be all powerful in the association between one gentleman and another, it is a suicidal policy on the part of either physicians or surgeons to treat the general practitioner otherwise than with ordinary courtesy. Again, the omission of such courtesy has the unfortunate effect of lowering the position of the general practitioner in the eyes of his patients, and this lowering tells unfortunately not only upon the pecuniary value of his services, but is a most effective means of impeding that steady rise in the status of the whole profession which is a necessary consequence of its gradually increasing intellectual elevation. It is most unfortunate, also, and greatly to be deprecated, when the general practitioner suffers himself to be governed in his association with physicians and surgeons by petty or envious feelings, rather than by motives based upon the honour of his profession. It grates upon the feelings of the physician or surgeon, and it is simply an injustice towards him, particularly if of any standing, to be summoned with the consent of the family medical man suddenly to a consultation, perhaps at some distance from his home, or at a time when moments are to him of the greatest value, and to find that the practitioner in attendance has never broached to the family the question of the fee, or taken care that it should be of such an amount as would justly remunerate the call made upon the physician's or surgeon's time. It is not right that he should, under these circumstances, be fobbed off with the least fee that can be offered to him, unless it become a question of charity towards the patient. Most frequently, and to avoid unseemly discussion, the physician or surgeon will pocket the minimum fee and say not a word, but occasionally less nice, or indignant, about the matter, he will demand what he considers to be justly his due, and an unpleasant scene may result. If the question were one of a mere trade character, in which each person did the best he

could for himself, physician and patient each striving to make the most profitable bargain, well and good ; but such is not the case ; and if the public generally are ever to be as thoroughly indoctrinated with a just conception of the nature of *honoraria* as the medical profession would wish, it is certain that unvarying honourable and generous conduct, one towards another, among ourselves, is requisite to the conveyance of that knowledge. Indeed, crude and false notions of the character of an *honorarium* with the public are chiefly due to shortcomings among the profession itself.

ART. XII.—PHYSIOLOGY AND LEGISLATION.*

THE philosophy of law is a subject which must always possess attraction for thoughtful and educated minds. Its scope is dependent on the development of the human intellect, and as this progresses, new laws are brought into view and new applications of principles, the evolving and orderly arrangement of which will at all times be to the student at once the object and the reward of his labour. As, however, art precedes science, the jurist is not in general the legislator. Legislation is a tentative process ; laws are the immediate offspring of experience, and the great practical use of jurisprudence is not exhibited in originating laws, but in correcting, moulding, and harmonizing them. The recognised course of legislation is “to remedy experienced evils and to extend experienced benefits,” and the speculative reformer has a long contest before him who would advocate changes by way of conclusion deduced from theoretical considerations.

The author of the work before us is of opinion that,—

“The philosophy of law at the present day is scarcely to the true science of legislation what alchemy was to the science of Lavoisier and Berzelius.” (p. x.) “That philosophical legislators hitherto have possessed but a Platonic love of nature, and have erred in thinking they could interpret and understand it without observation ; that they could, by the mere reflection of the consciousness upon itself, by the unaided effort of reason, know the entire man without studying his organization and his functions, or the organization and

* *Essais Physiologiques sur la Législation.*—Premier Essai :—De l'Interdiction des Aliénés. Par H. De Castelnau, Rédacteur-en-Chef du *Moniteur des Hôpitaux et des Sciences Médicales*, ancien Inspecteur-Général adjoint des Prisons et des Etablissements d'Aliénés de France, &c. 8vo. Pp. 202. Paris, 1860.

functions of other organized beings; that it was, in fact, possible to regulate his actions, that is to say, to formulate a theory for this object without bringing to the consideration of the various psychological phenomena which essentially constitute them, the certitude which is required as to all other natural phenomena not only before attempting their systemization, but even before considering them as definitively acquired by the particular science to which they relate." (p. xi.) "The true science of man, that is to say, physiology understood in its widest acceptance and in its highest sense, is the indispensable torch of every one who would aspire to give laws to his equals, for these laws, though apparently all conventional, ought not the less to be derived, in order to be just, and, probably, in order to be durable, from natural laws; but how can we draw conclusions if we are ignorant of the premises, and where are the premises, that is to say, the natural laws of man, if not in physiology?" (p. 4.)

The present work is an application of these views to the special subject of the French law relating to the "interdiction" of the insane. The application for the interdiction of a lunatic according to the French law is equivalent to our commission in lunacy; but the former has the advantage of being much simpler, and, consequently, less expensive. M. Castelnau mentions incidentally, that judgment of interdiction is obtained annually in upwards of six hundred cases, whereas we learn from the "Judicial Statistics" of this country for 1859, that the number of "Orders of Inquiry" in lunacy executed in that year was only sixty-nine, which is probably rather more than the number of lunatics whose estates and persons were committed to legal control under the authority of the Great Seal in the same year. The expense of this process, which the commissioners report is never less than 75*l.*, doubtless accounts in a great measure for the difference in the numbers of persons put under legal control in the two countries, and also confirms the commissioners' statement as to the necessity for the amendment and simplification of our own process.

The basis of the law of interdiction is contained in the 489th Article of the *Code Civil*, which provides that "An adult who is habitually in a state of idiocy, dementia, or furor, may be interdicted even though such state present some lucid intervals." The appointment of a guardian for the lunatic follows upon the judgment of interdiction; and Article 509 declares that "A person interdicted bears likeness to a minor as regards his person and his property; and the laws concerning the guardianship of minors shall be applicable to the guardianship of persons under interdiction." Article 450, Tit. x., *Of Minority, Guardianship, &c.*, provides "that the guardian shall have the care of the person of the minor, and shall represent him in all civil acts. He shall deal

with his property like a good father of a family." Such is an outline of the law to which our author seeks to apply the touchstone of physiology. Its weak point is in the words describing the class subject to interdiction, in Article 489. This Article suggested a memoir which M. Brierre de Boismont read about thirty years ago before the Academy of Sciences:

"He could not," he informs us, "from his own observation and experience, do otherwise than perceive its extremely limited application, inasmuch as cases of furor may have been common when patients were chained, beaten, and exhibited like wild beasts; but this state of things no longer exists; and in well-conducted establishments we seldom witness states of furor excepting as a temporary (*passager*) symptom of acute mania. The legal signification of the word dementia is very different from that which physicians understand by it as indicating a state of chronic debility, and sometimes rapid failure of the intellect. A very considerable class of insane persons—monomaniacs—are not even mentioned. Whatever latitude may be given to this 489th Article, logically and practically speaking, it would be impossible to include under either of these three denominations that singular aberration of mind which dwells on one idea, or rather on a series of ideas, while the person so affected appears to preserve the integrity of his reason on all other subjects."*

In its legal construction, we learn from M. Castelnau that the article in question applies to those "who cannot direct their conduct according to the dictates of ordinary reason, who are unable to manage their affairs, or are incapable of consecutive reasoning, and those who yield without resistance to all their desires; in a word, to those who, according to an expression frequently employed, but never understood, are not in the enjoyment of their *free will*," (p. 28.)

"It concerns us," says M. Castelnau, "to decide whether the physical reform wrought by Pinel may not now be completed by a moral reform; whether, in the same way that the illustrious alienist succeeded in delivering without danger a great number of unhappy beings from the bad treatment inflicted on them, causing them to breathe a purer air, and leaving them the free exercise of their limbs, we may not, without any increase of inconvenience, restore the greater number of them to moral life, and preserve them the enjoyment of liberty as the first of the blessings which civilized society ought to guarantee to man.

"Liberty is wrested annually, in France, by the application of Article 489 of the *Code Civil*, from more than six hundred citizens, guilty solely of having undergone an alteration, more or less marked, of the intellectual faculties, and of possessing property; and not only do they lose the liberty, in some sort physical and savage, of directing

* See *Journal of Psychological Medicine*, vol. v. p. 466.

their steps whither their will leads them, of satisfying their appetites when they feel the wish; but also that moral liberty born of civilization, more precious still than the first, of disposing of their goods either during life or after death, of disposing even of their person, and of seeking in the pure consolations of marriage and paternity an alleviation of their ills." (p. 9.)

Before proceeding to criticise the reasons and facts of the compilers of the *Code Civil*, M. Castelnau takes occasion to recal a principle, the forgetfulness of which on their part he deems has caused them to stray from the path of justice; and this principle is that of individual liberty, "which itself leads us to the foundations of all society." The consideration of this brings us to the first attempt to construct a law upon the basis of physiology.

"Theologians, and unfortunately, also, nearly all philosophers," writes our author, "have accumulated hypotheses, reasonings, volumes, and errors in order to fix these foundations on immovable bases; they have limited some to narrow, sometimes cruel doctrines, in opposition to the most evident laws of Nature; at which reason, if not both reason and humanity, consequently revolt; others to systems sometimes ingenious, sometimes *bizarre* or even ridiculous, and almost always impracticable, and whose least defect sometimes is, that they are wholly unintelligible. Is our destiny, then, an insoluble problem, or have our philosophers rather been wanting in genius? Neither the one nor the other: the destiny of man appears to us to be written in his organization, and philosophers have but wanted science and method. Without committing myself to demonstrations unsuited both to time and place, it will suffice for the object I wish to attain to recal,

"1st. That of all laws of organization, the most imperious is that which leads us to seek after pleasure and to fly from pain.

"2nd. That the instinct of sociability is not only an irresistible need of our nature, but a necessity imposed upon our individual weakness.

"3rd. That the satisfaction of these two needs requires that society respects our life, our property, and our liberty, and that we respect the life, property, and liberty of our fellow-men.

"These are primary truths, susceptible, nevertheless, of demonstration, but which, in consideration of their being obvious, we may be permitted to consider as axioms of sociology. It results, then, from these axioms that, in a society whose laws are conformable to those of nature, the liberty of a citizen would have no limits beyond those imposed by the liberty of others.

"Whoever, then, does not endanger the liberty of others ought to live free in society, whether he be, as we believe, a wise man or a madman: in respect to the right to liberty there is no difference between them." (p. 22.)

This appears to be a very important part of M. Castelnau's argument, and we have given it in his own words; but the first proposition involves a sophism so often and so long ago exposed,

that it is with a feeling akin to astonishment we see it intruded again into a serious argument. Plato has put certain words into the mouth of Socrates, in the *Gorgias*,* which, from their apt bearing upon the point in question, we may be forgiven for quoting at large:—

“*Soc.* Now listen to me while I recapitulate the discourse which we have had from the beginning. The good and the pleasant are not identical, as I and Callicles agreed. Is the good to be sought for the sake of the pleasant or the pleasant for the sake of the good? The pleasant for the sake of the good. Now *that* is pleasant by the presence of which we receive pleasure; *that* is good by the presence of which we are good. But we are good, and everything else which is good is good by the presence of some goodness or virtue. But the goodness or virtue of anything, whether it be a body or any bodily structure, or a living thing and a soul, cannot be a thing which belongs to it by chance and accident; it must come by some order and appropriateness and rightness of its parts. And so virtue in everything is something implying a certain order in its parts—a constitution. In every kind of thing its appropriate constitution it is which makes it good. And thus a soul which has its proper constitution is better than one which has not. Such a soul is rightly constituted. But a rightly-constituted soul is under control, is temperate. And so a soul which is temperate is good, a soul which is intemperate is bad. And a temperate soul under due control will do what is right towards the gods and towards men. It would not be under due control if it did not. Now what is right towards man is *justice*; what is right towards the gods is *piety*: and he who does such things is *just* and *pious*. And such a man will also be *brave*; for he whose soul is under due control will seek what he ought to seek and fly what he ought to fly, be it acts or men, or pleasures or pains, and will endure the stress of pain or danger when he ought to do so. And thus the man of rightly-regulated soul being, as we have said, just, and brave, and pious, must be in all respects a good man, and, as a good man, must do well, whatever he does. And he who does well must be happy, and the bad man, who does ill, must be wretched. And this bad man must be the man who is under no control. . . . And if it be true, I say that he who desires to be happy must aim at and practise self-control, and must shun the absence of control with all his powers. He must endeavour, in the first place, not to need correction; but if he need it, or if any one that he cares for does, man or state, he must try that it may be bestowed, if there is to be any hope of happiness. This seems to be the purpose, end, and aim of life. We must try as much as possible to cultivate temperance and justice if we wish for happiness. We must not, as has been held, let our desires expand uncontrolled, and then try to fill them—a bottomless abyss of evil—the life of a highway robber. A man who takes that course must be hateful to men and gods. He can have no fellow-feeling with other men, and when there is no fellow-

* Whewell's *Platonic Dialogues*, vol. ii. p. 223.

feeling there can be no friendship. And the wise affirm, Callicles, that heaven and earth, and gods and men, are held together by the attraction of a general sympathy—by friendship, and orderliness, and control, not by disorderliness and uncontrol.”

Unless we are prepared to say that the Good and the Pleasant are identical, how can we admit the proposition, that the most imperious law of our organization is that which leads us to seek after pleasure? And if we believe that control in some shape is necessary to the happiness of all men, how shall we say that the man who is incapable of self-control, “who yields without resistance to all his desires,” is not to be controlled? Surely, if we have any regard for him, we must endeavour, for his own sake, not less than with a view to our own interest, to supply his deficiency. Again, if control is universally necessary to happiness, the man incapable of self-control must be happier under the wise control of others than he would be if uncontrolled, and we are therefore in no way bound to admit with M. Castelnau, except in a much wider sense than would suit his argument, that—

“To act in the interest of the insane, in interdicting him, can only be understood to mean one of the following things:—1st, To soothe his sufferings; to restore his health, or at least to hinder him from hurting it, by the acts of a disorderly life. 2nd, To assure the satisfaction of his legitimate desires, and to preserve him his property and the full enjoyment of his income.”

This proposition is made as the basis of an argument, the irrelevancy of which is sufficiently apparent. “Health,” says our author, “is undoubtedly a great blessing, for without it life is but a long martyrdom, a prolonged vegetation; but there is a greater blessing,” and, quoting a saying of “the judicious Procureur-Général Merlin,” he says, “Liberty is the greatest of blessings, that of which man shows himself most jealous.” Further, he concludes that “if, in order to give the first, one is obliged to take away the second, one takes away the greater to give the less.” But absence of control does not constitute liberty, neither is the Procureur’s panegyric applicable to licence.

But M. Castelnau attempts to prove by statistics that the judgment of interdiction exercises a prejudicial influence on the persons subject to it, and is chargeable with lessening the number of cures amongst them, as compared with the cures amongst the general class of insane patients who are not interdicted. We are bound to say that, to our apprehension, the proof is wanting. The following are his statements upon this point:—

“The science of mental therapeutics at the present day pretends to cure one patient out of three. This pretension does not appear to me

to be established by data free from all objection, but everything leads to the conviction that, if not rigorously true, it approximates to the truth very closely. The latest statistics give, for the year 1853, one cure out of 3·27, or 30·5 per cent; and although these statistics do not furnish all the materials necessary, the figures that they give yield an approximation sufficiently close to enable us to neglect, without inconvenience, the possible error. One cure out of 3·27 is not a result of which science has any reason to be proud, and it is not for such a prospect that one would desire to interdict a patient, if one had regard solely to the interest of his health. What should we say, then, if, by a mystery at present impenetrable, the interdiction reduced by SEVEN OR EIGHT TIMES this chance of cure, and if, instead of having, like the generality of patients, one chance of cure out of three and a quarter, the patient, from the time he is interdicted, should have but one out of TWENTY-THREE AND A THIRD? Such is nevertheless the frightful reality. This is how it is arrived at:—

“*Interdiction ceases with the causes which have determined it.* Such is the law. The malady constitutes the causes. When a cure is obtained, the causes no longer exist; the interdiction ought therefore to be taken off. The number of cures may then be rigorously estimated by the number of judgments of *main-levée* of interdiction.

“During six years, then, taken at hazard (1842, 1843, 1844, 1847 1848, 1857) there were 3201 interdictions pronounced, and 137 judgments of *main-levée* of interdiction; equal to one cure out of 23·38.” (p. 43.)

Nothing can be more fallacious than statistics when appealed to after this fashion. No information is given as to the ages of the two classes of patients, the average duration of the disease in either class, or the specific character of the disease. It is quite possible that many persons who have been interdicted may be discharged cured, who do not apply for the judgment of *main-levée*, but, probably, the most important source of error would be found in the different meanings of the word “cured,” as applied to the two classes of patients. It is exceedingly probable that a patient would be discharged from an asylum as cured, under circumstances in which it would be difficult for a court of justice to recognise his competency. It must be remembered that, once a man is declared insane, the burden of proof is upon him when he applies to be discharged. Lord Eldon one time observed, “that there was no part of the jurisdiction in lunacy more unpleasant, and requiring greater caution, than that of determining when a commission should be superseded; for, though a safe conclusion may, upon evidence, be arrived at in establishing lunacy, it is very difficult to determine when the mind has been restored.” But, after all, M. Castelnau’s whole argument is directed against the results of interdiction, viz. the loss of liberty, of the right to dispose of property, and of the right to marry. Now, are not all

lunatics under treatment subject to these disabilities? and, if so, there is no difference, as far as we know, between the treatment of the interdicted and the non-interdicted beyond the mere judgment of interdiction pronounced by the Court; and statistics which show that the effect of this judgment is so disproportionate as M. Castelnau suggests, really prove too much. If M. Castelnau's argument is good, and if the greater number of those against whom formal judgment of interdiction is pronounced, are improperly deprived of personal liberty, and of the right to dispose of property, and to marry, *à fortiori*, we should think a much greater number of those under treatment, not being interdicted, must be improperly deprived of those rights. But the medical treatment of lunacy is so dependent upon the power of control over the patient, which involves the suspension of these rights, that, without it, all treatment according to our present knowledge must be abandoned, and yet, as M. Castelnau admits, we cure one patient out of three. Surely, this is a result of too great value to be given up on mere theoretical grounds. Few will be disposed to question that all forms and shapes of insanity do not call for the same degree of direct control; as, for instance, there are many persons undoubtedly insane in the strictest sense of the word, whom it is not necessary to confine in an asylum, and who ought not to be so confined, provided they are so circumstanced as to admit of their having the necessary degree of control and supervision combined with a greater amount of liberty than is compatible with the discipline of an asylum. But we deem it logically impossible to concede to any person formally adjudged to be habitually in a state of idiocy, dementia, or furor, absolute liberty of his person, or the like liberty to dispose of his property. With respect to the right to marry, M. Castelnau argues as though he thought the law debarring a lunatic of this right, depended upon the inheritability of insanity, whereas it follows, from his general incompetency to bind himself by any contract, and if not the necessary result of his incompetency to dispose of his property, depends upon the same arguments. There seems abundant reason, from what M. Castelnau says, to conclude that there is much need for reform, either in the law or the administration of the law, with reference to the property of lunatics. We may say the same at home. The subject has been found very difficult to deal with, but hitherto there has been no doubt with us about the principle, that a lunatic so found by inquisition is properly disqualified for absolute liberty of person, or the usual rights of property. There is, perhaps, less room for any such doubt with respect to persons found lunatic by inquisition, than with respect to persons who may be properly interdicted under the law as it stands in France. The careful accuracy of our legal forms in reference to this

subject is worthy of notice, and contrasts favourably with the looser expressions of the French code. Thus, before the Lord Chancellor can commit the custody of the person and property of a lunatic to a guardian, it must be found that the lunatic "is of unsound mind, *and incapable of managing himself or his affairs.*" Even M. Castelnau could scarcely object to the conclusion based upon such data.

We cannot terminate our notice of M. Castelnau's work without, in some measure, qualifying some of the preceding remarks by a general expression of satisfaction at the spirit of the essay. The writer's object is undoubtedly one in which all our readers will wish him success; and, in the treatment of his subject, he brings together the ideas respecting insanity held by the compilers of the Code and upon which its provisions are based, and he criticises them with much discrimination. Now that we are about to enter on the discussion of a large measure of reform, it cannot be amiss to consider what our neighbours have done, and are doing, on the same subject, and there is much in the present volume deserving of careful consideration.

ART. XIII.—MISCELLANEA MEDICA.

I. DR. GILBERT SKEYNE, MEDICINAR TO JAMES VI. OF SCOTLAND.

THE Bannatyne Club has recently published two highly interesting tracts, the authorship of one of which is due, and of the other is attributed, to a certain "Maister Gilbert Skeyne, Doctour in Medicine," who flourished in Scotland in the sixteenth century. He was the fifth son of one James Skeyne, "Notary and Farmer," who was killed at the battle of Pinkiecleugh, and who was a descendant of "a small race of barons whose origin is lost in antiquity." One branch of the family is still nobly represented. Gilbert, born about the year 1522 or 1523, received the customary education at the Grammar School and King's College, Aberdeen, and graduated as a Master of Arts; after which he applied himself to the study of medicine, took a doctor's degree, and in 1556 was appointed "Medicinar," or Professor of Medicine in King's College. While holding this position he published his tract on "the Peste," and this has now been reprinted by the Bannatyne Club, "page for page, from perhaps

the only copy known, preserved in the Advocates' Library." He subsequently received other collegiate honours, but in 1575 he removed to Edinburgh. It is suggested that he was probably induced to take this step by his little tract having brought him into notice. He must have attained some celebrity in the practice of his profession, as on the 16th of June, 1581, he was appointed doctor of medicine (Medicinar) to His Majesty King James VI., and had granted to him an annual pension "of the sowme of twa hundreth pundis," money of the realm. In the same year, also, he was selected, together with Mr. Gilbert Moncrieff, surgeon, to inspect the Earl of March's person, in the celebrated divorce question between that nobleman and Dame Elizabeth Stewart, Lady Lovatt.

Doctor Skeyne appears to have retired from practice in 1593, and he died in 1599, leaving no family, but survived by his widow.

Of the two tracts now published, one entitled, *Ane Breif description of the qualities and effectis of the well of the woman hill besyde Aberdene*, is of local rather than general interest. The author's name is not attached to the tract, but the Secretary of the Bannatyne Club considers that it bears internal marks of being the production of Dr. Gilbert Skeyne. It bears the date of 1580 on the title-page, and it is the earliest known topographical tract connected with Scotland.

The tract on the Plague is of singular interest, not only from its containing an admirable summary of the opinions which may be supposed to have been entertained by Scottish physicians about the middle of the sixteenth century, on the nature and causes of the pestilence, but also from its being a very curious specimen of early popular medical literature.

The title-page of this tract reads thus:—*Ane Breve Description of the Pest qhair in the causis, signis and sum speciall preseruatioun and cure thairofar contenit. Set furth be Maister Gilbert Skeyne, Doctoure in Medicine. Imprintit at Edinburgh be Robert Lekprevik. Anno Do. 1568.* A succinct description of this little dissertation cannot fail, we think, to interest our readers. As many of them, however, might perchance stumble over some of the Scottish words and phrases, and might also have no dictionary of the language at hand to help them, we shall be pardoned, perhaps, for substituting in the quotations we shall give, English for Scottish words, although in so doing we sacrifice, in no small degree, the *crispness* (so to speak) of the writing.

Dr. Skeyne prefaces his tract with the following observations "to the Reader:"

"Since it has pleased the inscrutable Counsel and Justice of God (Benevolent reader) that this present plague and most detestable dis-

ease of Pest be lately entered in this Realme, it becomes every one in his own vocation to be not only most studious, by perfection of life, to mitigate apparently the juste wrathe of God toward us, in this miserable time: But also to be most courageous in suffering travail, for the advancement of the common wealth. I being moved in that part seeing the poor of Christ in lack, without assistance of support in body, all men detesting inspection, speech, or communication with them, thought it expedient to put shortly in writing (as it has pleased God to support my sober knowlege) what becomes every one both for preservation and cure of such disease wherein (good reader) thou shall neither abide great erudition nor eloquence, but only the sentence and judgment of the most ancient writers in medicine expressed in vulgar language without polite or affectionate terms. And howbeit it become me rather (who has bestowed all my Youth in the Schools) to have written the same in Latin, yet understanding such enterprises had been nothing profitable to the common and vulgar people, thought expedient and needful to express the same in such language as the unlearned may be as well satisfied as Masters of Clergy. Which being acceptable and allowed by the Magistrates of this Noble Burgh, conform to my good mind, shall, God willing, as occasion and time suffers, treat this same argument at most length, which presently for utility of the poor, and shortness of time, is moved to set forth almost rude and imperfect, not doubting, gentle Reader, but thou wilt approve the same with such like mind as the poor Woman's oblation was approved by the Good Lord, who may preserve thee in health of soul and body for ever and ever. So be it."

Following these remarks is, "Ane compendious description of the Pest," and, in the first Chapter, a Pest is described as "the corruption or infection of the Air, or a venemous quality and most hurtful vapour thereof, which has strength and wickedness above all natural putrefaction, and being contracted first most quietly infects the spiritual parts of man's body, thereafter the humours, putting soreest at the Natural Humidity of the heart which, suffering corruption and fever most wicked (pernicious), quietly and thief-like strikes the patient, whose body exteriorly appears well at ease, but interiorly is most heavily vexed." It is a feverish and most cruel infection, in sundry ways striking down many hastily. It is, therefore, a most vehement and high disease, and most dangerous, "because it is difficult to know all things which make a man propense to become Pestilential. Always, whatever has its cause from the Heavens, or corruption of Air, is properly, by most learned, called a Pest; and whatever is generated within us, or of other causes, is called a Malignant Fever."

Chapter II treats of "The Causis of Pest"—

"It were difficult and tedious," writes the author, "to treat of all the causes of a Pestilence. Therefore, at this present, I shall commemorate the principal only, by the which the rest may be understood.

"Certain it is, the first and principal cause may be called and is a scourge and punishment of the most just God, without whose disposition in all things other second causes work nothing. So the Heaven, which is the admirable instrument of God, blows that contagion upon the face of the Earth, as when the most noxious Starres to mankind convene, which by Astrologers are called unfortunate. Or when Comets, with other wicked impressions, are generated and preserved in the air, which, of itself, being most simple substance, and so incorruptible and necessary for man's life, natheless receives and admits, both from the Heavens and inferior Elements, many infections and corruptions which are the seed and chief causes of sundry diseases which are called epidemical, and these causes in most part are universal. Inferior causes are those which occupy a Realm, a people, a City, or a house thereof. Cause, therefore, is standing water, such as Ditch, Pool, or Loch most corrupt and filthy; Earth, dung, stinking Closets, dead Carrion unburied in especial of mankind, which, by similitude of nature, is most noxious to man, as every brute is most infecting and Pestilential to their own kind. Further continual showers of wet with great rushing wind, or the same blowing from pestiferous places. The cause of Pest in a private City is stinking corruption and filth, which occupies the common streets and ways, great smoke of coals without wind to despatch the same, corruption of Herbs, such as Kale and growing Trees, Moist heavy savour of Lynt, Hemp, and Leather steeped in Water. A private house, infected either of stinking closets or corrupt Carrion therein, or near by, or if the inhabitants have frequented other infected Rooms, or drinking corrupt Water, eating of Fruits or other meats which are corrupt, as we see daily the poor more subject to such calamity, nor the wealthy, who are constrained by poverty to eat evil and corrupt meats, and diseases contracted thereof are called Pandemial. In every one the cause is abundance of corruptible humours collected and generated of meats and drink which of any light cause become corrupt, in man's body as wicked as deadly poison. Finally and principally, infected Air, which all men draw of by inspiration of necessity for continuation of life. By the which, first the spiritual parts, secondly the humours and natural parts are sore put at, in some hastily, in others slowly or never, as one or another is accustomed to diversity of meats as the body is prepared and propense to corruption, and finally as dwelling and passion of the foresaid causes favours."

Chapter III treats of "The Signis of Pest." That is to say, the forerunners or indications of approaching Pest, and our author first observes that, "be cause the signis of the Pest to cum, per-tenis to preseruatioun fra the same it becumes to treit thame at mair lenthe." The "first, truest, natural sign," he tells us, is continual wet without winds in the last part of Spring or beginning of Summer. Great and persistent heat, or Southerly Winds with turbid, misty air without wet, signify "a Pest to come in the Autumn next following." The "secund signe" is when Eclipses of the Sun are great and frequent, when Comets, or "fyrie inflam-

mationnis," or falling stars, are seen, "for such things proceed and are generated of great drought, and hot fiery Vapours, which corrupt the Air, especially in the time of Autumne." If growing trees appear to wither (birne) it is a more certain sign of the calamity being at hand. "If the Air perseveres long time dry, as full of powder, with thik dry Clouds (as notably appeared all this last Summer) shows a Pest to follow of such nature." When the Air appears troubled and thick in Autumn and Winter as if wet were to follow, and wet then follows, that "constitution" is assuredly most corrupt. A pest in Summer is indicated when the Spring is dry and cold, southerly winds, with perturbed air, sometimes heat and other times cold, occurring afterwards, "which also signify Pocks and Measles and such like diseases of the body to follow."

"Both the former invade at all times of the Year, but least in Winter and Spring, often in Summer, ofttest of all in Autumn, which most notably may be examined exposing fresh Bread to the Air one night, which if it corrupt most certainly the pest is at the door, if it be not already entered, as frequent mad Dogs prognosticates famine, which by infection of Air or Water become mad. In like manner Wolves entering in a town, with continual molestation, is sign of madness, for over great audacity shows phrensey, and by the same cause, that brutes, become furious or degenerate from their own custom of leaving, such humours corrupt in man's body as may generate a pest which are melancholy infected, by pestilential corruption of Air or Water. As before such times, the Sheep, which are more weak of nature nor man by death are afflicted, precedes also multitude of Frogs (*Padokis*) and Domestic Worms called in Latin *Blattæ*, which are generated of superfluous fat humidity, most repugnant to the health of man: as when the mole and serpent leave the Earth, being molested by the Vapour contained within the bowels of the same, which infection brings baith man and beast to death, the sooner if such increase of long time, and specially when the Domestical fowls become pestilential, it is a sign of most dangerous pest to follow, because when the drier and freer beast is infected, much more shall man who is more Humid of nature, and subject to less liberty, which may increase by baneful (wickit) mutation of the four times in the Year touching the principal qualities and natural constitution thereof, as a notable change of a natural day shall testify. Such like when pocks or such Pustules are frequent not only among bairns, but also among those who are of constant or declining age, great frequent south and south-west winds. If women with children through slight occasion part from their birth as when after vehement heat in Summer, wet follows, and abundance of Frogs appear, coloured gray on the back, of purple or any diverse colour on the wombe. As when Roses and Violets spring new in the Autumn, innumerable Worms, Flies, and serpents, great death of beast and fish, great dearth of Food, whereby men are constrained to eat evil and corrupt meats, most certain of all, hot and Humid constitution of the whole Year, the Sun at one hour shining, thereafter obscure with turbulent

Air, pronounce a Pest to follow. And therefore universal signs are to be observed."

Chapter IV. treats of "Quhat placis are maist Pestilential." Those places are more subject to pest, the writer asserts, which are near by the sea, "situate towards the south on height, whereby is abundance of corrupt Standing Water, where many dead are buried, where the ground is fat, and Evaporation increases most in time of Sun and Moon," and other celestial and planetary conjunctions. Those individuals are most subject to pest who have "abundance of thick corruptible humours," unless these humours be evacuated by bleeding, purgation, or the less sure preservative of a running sore. Such persons in particular are Children and Young Men and Women, "in their flower," who are of humid and hot temperament. Next are the hot and dry, last the dry and cold; "howbeit, the last are more difficult to cure than the first." No pest continues during more than three years, "either because it has not to urge or the Air being of most light substance may not suffer further putrefaction and which was corrupt before, further becomes not corrupt, as roasting once cannot be made raw again, and scarcely in so long time is the Air moved and renewed, and which was corrupt transferred in winds." Lastly, our merciful and omnipotent God puts measure to the pains of the wicked.

Chapter V. teaches "Quhariby corrupt be pest may be knawin;" and Chapter VI. makes known the "Signis of deth in pestilential persons." Chapter VII. treats largely of "Preservation fra the Pest." We are instructed, as "the principal preservative care," first of all to supplicate God's grace and assistance through Christ; and secondly, "not pretermittin such support" as it may have pleased God to show us, reason "prescribes preservatives to consent in two things: first, to prepare the body apt to purgation; secondly, to make it which may offend weak in action or impression." The first object is to be obtained "by mundification and corroboration of the body," getting rid of all superfluous or corrupt humours by bleeding or purgation; the latter as being perfected many ways "by the intestines, urine, exercise, sweat, fasting, and diffation. The second object is to be sought by every one removing themselves from infected or suspected localities or atmospheres, and those—

"Who will not do the same, or moved by Christian Charity will not, must be studious to live in free Air, eschewing such constitution of Heaven and Elements as before is expressed to be most wicked, as cold at morning and evening, flavour of ditch or corrupt river, with all other filthy corruption, correcting the air universally or privately by fire and suffumigation made by aromatical materials, hot or cold, as

the present constitution shall require, for certain it is, by experience of Medicinars observed at all times, that fire is an Antidote contrary the pest and all corruption."

A good list of aromatic herbs fit for suffumigation follows, with sundry complex recipes for combinations of the same, and their formation into "lozenges, thick powders, candles, or odorative paste (*pomis*)."

Other recommendations are, in summer :—

"Dwelling toward the northe, tempering the air in private lodgings, by aspersion of cold water mixed with vinegar, or clothes that be therein, and hung by the walls as tapestry, leaves and flowers of cold herbs, which, by contrary qualities, temper and correct all pestilential corruption of the air, being used at the fairest hour of the day, opening door and windows towards the Septentrional parts: in other times of the year, towards the Orient, if nothing be repugnant thereto. Observing, also, that no domestic beast, such as Dog or Cat, stray abroad in time of pest."

Those in health who have to speak to suspected persons, and who refuse to take or who neglect other means, are directed to put in the mouth some anti-pestilential drug, as, for example, root of angelica, or to take a dose of some preservative preparation (several being duly prescribed) in the morning, &c. "But in such weighty disease, more profitable it were to use preservative remedies, in conformity to the logical cure before insinuated. . . ."

"Of exterior preservatives, fair clean clothes are most commendable, with oft changing thereof, and dwelling in lodging patent towards the occident or septentrion, far from corruption, wherein odorative trees, herbs, flowers, before expressed, are used in suffumigation, burning, or inspersion: no man passing forth from his lodging, until two hours after sunrise, noways in misty weather, without necessity compel, and that be after meat rather than fasting, anointing also the stomach, lever, and secret members with this ointment. Ric. olei rosati, omphacii unc. duas, olei de spica unc. semis, pulveris cinnamoni, gariophyllorum, sing. drac. semis Rosarum sandalorum citrionorum, cujusque drachma, cum modico cero et aceti sof. fiat unguentum molle. All meats preservative must be of good subtle substance, and dry in especial for those who are of a humid temperament. Travail and great fasting mundifies (I grant), but weakens therewith: as laborious exercise, or sweating, in corrupt Air are most dangerous; therefore, temperance, in travail or rest, sleeping or walking, meats or drink with temperate hilarity, are most commendable. Touching meats, flesh is most proper which generates laudable humours, and is of facile digestion, Such as Partridge, Pheasant, Laverock, Hen, Turtle-Dove, Kid, Mutton, *Cunning*, Veal, and suchlike others, using

therewith Cloves, and powdered Cinnamon; all fish must be sodden with water, vinegar, powder of Cinnamon and Ginger. Abstaining from daily use of fat or sodden meats. Of herbs, the *Lettuce*, *Chichory*, *Purpie*, *Sourak*, *Pimpinell*, *Vetoun*, *Finkill*, *Anethe*, *Borage*, *Endive*, *Garlick*, in little quantity, *Raphorte* dissolved in Wine or Vinegar, may be used, preparing the same as becomes every one in their own nature. Of fruits, figs, bitter almonds, dry raisins, sour apple or pear, orange, citron, or lemon, capers, sour prunes or cherries, with daily use of vinegar or verjuice, with all sorts of meats, drinking clear, white, odorative wine, tempered with water, washing face, mouth, and hands, at morning, with wine tempered with rose-water, drawing at nose the decoction of the leaves of laurel, and anointing the ears with oil de spica, having in mouth the seed of citron, abstaining from sleep in daylight, Ire, crying, Venus plays, as from most dangerous enemies. Abstaining also from meats which corrupt hastily, as from variety of the same, which offend at all times, and especially fruits which be collected after contagious air, Swine flesh, Fowls that swim in water, using at morn a spoonful of the root of Aristoloche in powder with half wine, which resists to putrefaction and purges the heart pipes. Suchlike the powders of Unicorne, bol armenian, Harts horn, Pearl, Coral, Smaragde, Sapphire, Jasper, Ruby, drunk with convenient decoction, are most preservative."

Those who are constrained to visit the afflicted with plague must "first of all remove the opinion of death, but not the dread of God, therefore neither delight in peril, nor temerariouly incur the same, without charity toward thy neighbour, or the glory of God (which is to be preferred to all thing) move thee."

Chapter VIII. treats of "Cure of the Pest;" and the tract concludes with an aspiration, that God would "indue us with the spirit of repentance, that unfeignedly we may convert us unto him, reforming our depraved and corrupt living in times past. And also apply ourselves in times coming, and the obedience of his Godly will and observing of his commandments, that thereby he may not only remove such punishment and Plague from us, but also that both rich and poor may live in such Godly and civil Society, as may be agreeable to his Godly will, that, finally, we may be participant of his kingdom, prepared for his Elect from the beginning."

II. SPANISH MEDICAL PRACTICE IN THE SIXTEENTH CENTURY: ILLNESS OF THE SECOND WIFE OF PHILIP II.

We are indebted to Mr. Turnbull, late Calendarer of State Papers, for the following very curious letter, now for the first time published. It is from the English Ambassador in Spain to Queen Elizabeth, and the person to whom it relates was Elizabeth, daughter of Henry II. of France, and second wife of King Philip. The letter is remarkable, not only as exhibiting the

state of medical science at that time in Spain, and as written by an envoy to a maiden sovereign, but as showing in the parts designed to be written in cipher, that, had her Majesty died, Philip designed to have married Mary Queen of Scots, a circumstance, we believe, that has never been noticed before:—

“ Sir Thomas Chaloner, Ambassador at Madrid, to Queen Elizabeth. Draft. Spanish Papers. State Paper Office.

“ Please it your Majesty. By letters of the 10th hereof, deposited in post by my servant Coldwell, amongst other things I gave the same advertisement of the Queen Catholic's sickness, which hath sithence proved such as I have thought it more than pertinent to signify the rest as followeth. On Saturday, at night, the 5th hereof, her Majesty having certain tokens that she was with child, reckoning from the 27th of May last, with great joy of the King and all folks here for that good adventure, insomuch as the Sunday following a solemn triumph was prepared to have showed her pastime, fell sick of a fever, at the first not much accounted of. But when it continued that daye, and all Sunday, on Monday the Spanish physicians (contrary to the opinion, as I hear, of her own doctor, an Italian) let her blood of the one arm, and the next day of the tother in great quantity, esteeming that the plucking away of her blood should allay the fervency of her ague, the event whereof proved contrary. For not only that letting of her blood (as should seem) exasperated her sickness, but what with the affliction thereof in these canicular days, or some other hidden cause, the second night after, her matrice opened, voiding a great quantity of that natural aliment which children in the mother's womb are nourished by, and the next morning after she dispersed of two female children, to the great sorrow of the King and all the Court here. With this her fever increased more fervent, with vomits, pains of the mother, and other very evil accidents, pronouncing no good hope; whereupon she was eftsoons the third time letten blood in the foot for allevement of the pain of the mother. For short, her sickness prevailing, notwithstanding all human remedies that these men could apply, at last about the eleventh day of her falling sick she began to rave and so fall into profound sleeps of lethargy, against the which neither the binding straight of her arms and legs, nor the searching to let her more blood at her nose and other places (for not one drop would follow, no more than of twenty ventoses or more applied all at once to sundry parts of her body), nor other inventions, could withstand the stronger violence of the burning fever and lethargy that held her. So far forth, as the fourteenth day, being the critical, the physicians pronounced she was not like (continuing those accidents) to escape. But yet for all this she a little amended, and came to herself again; so as on our Lady day, the 15th hereof, she was houselled, and the King (to comfort her the more) for company. And ever sithence with divers changes, one half of the day well, the other half evil, now giving hope almost assured of amendment, and now eftsoons relapsing, she passed Friday last the peremptory fourteenth; whereupon what joy the King and all

folks took I need not write. But yet again, on Friday night her lethargy or profound sleep returned, with idle talk and other ill tokens. And, nevertheless, on Saturday morning she bettered again, but was in such wise all this while as that her ague more or less did leave her. So as towards the self evening she fell speechless, her mouth with an apoplexy drawn up to her ear, with the benumbing of her right arm and side, and in effect abandoned of the physicians, at this instant hour, *hora noctis undecima* 19 *Augusti*, she lieth at the mercy of God. The palace gates are shut; the lamentations in the Court, both of men and women, very tender and piteous; the chapel filled with noblemen, all praying upon their knees for her; and generally great and unfeigned moan made on all parts, as well for the favour her virtues and gentleness obtained at all men's hands, as for the good hope they had she should have been the mother of many princes, and lastly, for the fear men have lest as this matrimony allied two so mighty princes as her husband and brother be, so possibly this disgraced chance may breed I wot ne'er what hereafter, or at least accelerate it the sooner.

"This far furth I wrote the self Saturday night, having purposed in case the Queen had then deceased to have furthwith sent away this bearer with advice thereof to your Majesty. But on Sunday, towards morning, she began eftsoons to come to herself again, spoke, and took sustenance, and gave certain hope the worst was past. So as that Sunday, and also Monday last, account was made almost of her escape, but doubtfully, for even in the night her ague and other paroxysms more or less returned; so as what between now hope, now dread, with infinite processions of all sorts made here. At last, on Tuesday, the 22nd hereof, her paroxysms and other accidents, such as on Saturday afore, returned with like extremity, great number of ventoses applied prevailed not either to quicken her lethargy, which they term here *Modorro*, or else to draw blood from her. For brief, physicians and all others despaired of her health, but after Tuesday and Wednesday past with great danger and jeopardy even to the even unction, at last, by means of a strong purgation of *Agaricum*, that made her have twenty-two stools, given at a venture in so desperate a case to purge those gross humours, she ever sithence has amended, and at this present is counted past danger, with no small rejoicement on all sides. And I for my part as glad as one *for avoiding of that casualty which my former letters of the 11th hereof do partly touch.* Assuring your Majesty that amongst ambassadors and others in this Court, the account already was made the King would be a suitor that ways. But though this occasion be passed, I shall never well think the case well assured till that party be married out of these folks' reach, or of any other prince whose power may readily embrace any quarrel or claim that is pretended. *Howbeit, in this behalf I believe the French would be as unwilling as we that these men should become our so near neighbours in Scotland, and would let it all they might, how ready soever those of Guise percase would be to set it furth.**

* The words underlined were intended to be written in cipher in the fair copy of the letter.

"On the latter part, a six days past here are certain news come of the Emperor Fernando's decease. The king a two days past in mourning apparel visited and condoled with his nephews here of Bohemia.

"Hitherto the King's gallies touching their intended enterprise are little spoken of; I wot not what it meaneth, but perchance for this year it may prove to nothing.

"In Corsica, Signor Pedro Corso so bestirreth himself as (the fortresses excepted) the whole island is at his devotion. If he hold out this winter, it is thought the next spring he shall have strong aid from the Turk.

"And thus, not wotting what more to write than I have written touching my humble suit for my return, driven to the extremity of all that may here be misliked and force a man to be parting hence, I pray God send your Majesty all glad and good things. From Madrid, the 27th day of August, 1564.

"T. CHALONER."

ART. XIV.—THE "ART OF RISING" IN PHYSIC.

THE *Medical Directory* for Great Britain, now for the first time published in a single volume, and containing the names of more than 16,000 practitioners in various departments of the healing art, can hardly fail to suggest important questions with regard to the sources of demand for so much talent, and with regard to the means by which individual members of the profession contrive to raise themselves above the respectable mediocrity of the great mass of their brethren. The pass-lists of the examining bodies show that the yearly average of additions to the licentiates in physic and surgery considerably exceeds 1000, and hence, to this number of young men at least, the art of rising in physic embraces questions upon the solution of which the conduct of their lives must turn. And not of their own lives only; for their relations with the public are of a nature to cause the influence of their example to be both widely spread and deeply felt; so that the doctor, in no small degree, reacts upon and moulds the characters of his patients.

Presupposing the possession of a sufficient income, either from professional or private sources, to remove any anxiety about daily wants, it would seem, *a priori*, that the medical profession, of all possible callings, is the one most calculated to develope every intellectual and moral excellence to which man, in this life, can attain. Removed from the larger ambitions of the world, from the jobberies of political craft, and from the ostentations of commercial prosperity,—familiar with the summons of the dread visitant that dissipates the visions of human grandeur, and prevents the anti-

cipated triumphs of human skill,—standing upon the threshold of sciences that shadow forth, even as we see them in their veriest rudiments, something of the power and the wisdom of Him in whose fiat they have had their origin,—placed in a path of duty that harmonizes, in outward deed at least, the love of self with the love of the neighbour, and makes the benefit of others the surest passport to success,—the healing art might be expected to combine the advantages of a life of practical benevolence with those of a life of philosophic contemplation; and might afford to its followers at once the benefits of activity, and the dignity of repose.

And if we glance, either retrospectively or around us, at the worthies of our craft, we shall find that many among them have displayed, and that many still display, a perfect consciousness of the elevation of their calling. Not only in the daily lives of men whose scientific eminence has made us acquainted with the most trivial details of their conduct, but also in the general tone of thought which prevails among the public with regard to the most respected practitioners of any given locality, this consciousness is practically shown. That there should be numerous exceptions to the rule is a twofold necessity, depending both upon the essentially intrinsic character of human error, and very greatly also, upon external circumstances.

For, in the anxieties of life, and in some measure from the circumstance that the licensing bodies of the profession have opened a door cheaply for the admission of students whose special education has been meagre, and whose general education has been positively *nil*, added to this, that the possession of a qualification has usually enabled a single man to obtain an immediate pittance as an assistant or a parish doctor, numbers of persons have become legally qualified to practise without possessing either the pecuniary means or the mental culture necessary in order to enable them to wait patiently for that moderate portion of success which is the invariable reward of the deserving. Such men as these, often with considerable talent and energy, but usually throughout their lives conspicuous rather by their activity than their weight, create and maintain a turbid and eddying backwater by the side of the steady current of professional opinion. If they eventually reach high places, their examples tend to confusion of thought about the first principles of ethics; and frequently beguile the inexperienced into a belief in the existence of an art of rising, to be studied separately from the art of healing. They have induced some, it may be feared, to give an exclusive attention to the former; and to neglect their proper studies in quest of some imaginary, often underhand, means of "getting on;" in accordance with the vulgar superstition that so often attributes the success of the successful

man to his weakness, which can be imitated, rather than to his strength, which cannot.

The most marked illustration of this principle that our own day has furnished was the prevalence of what may be termed the “Abernethy manner,” during, and subsequent to, the latter part of the career of the great man whose outermost shell of peculiarity was thus feebly travestied. Full of years and honours, it was the practice of John Abernethy to be plain-spoken—to let his strong common-sense assert itself against empty pretension, and his wit to flash its scorn of arrogance or affectation. Having acquired, by careful study of innumerable details, and by a vast and varied experience, the power to decide rapidly upon most professional questions, and having his day by far too short for his daily labours, it was his practice to save himself, and to forbid his patients, any indulgence in the loquacity that loves to babble of empty trivialities. And so, the youthful aspirant for professional success, forgetting that this manner was greatly the result of circumstances—forgetting that it was, in many instances of its display, an unsightly blemish upon a most benevolent and noble character—forgetting that manner, in order to be impressive, must always be original, the natural outgrowth of the mind—and too often forgetting that no man has a right to be decided, unless his decision rest upon hard study and wide experience—forgetting all these things, has sometimes brought a fancied imitation of his great teacher to the bedside of the humble and the poor, has checked, with cowardly bearishness, or coarse *brusquerie*, the timid relation of symptoms often of grave import, and has justified the bitter lines of the satirist, “Nature’s sternest painter, yet the best.”—

But soon a loud and hasty summons calls,
Shakes the thin roof, and echoes round the walls ;
Anon, a figure enters, quaintly neat,
All pride and business, bustle and conceit,
With looks unaltered by these scenes of woe,
With speed that, entering, speaks his haste to go ;
He bids the gazing throng around him fly,
And carries fate and physic in his eye ;
A potent quack, long versed in human ills,
Who first insults the victim whom he kills ;
Whose murderous hand a drowsy bench protect,
And whose most tender mercy is neglect.
Paid by the parish for attendance here,
He wears contempt upon his sapient sneer ;
In haste he seeks the bed where misery lies,
Impatience marked in his averted eyes ;
And, some habitual queries hurried o’er,
Without reply, he rushes to the door.

There are not wanting, however, persons with whom this style of demeanour is almost necessary, nor places where it may be used with effect. Among the members of small communities, always prone to magnify that which appertains to their locality, always certain, as an adjunct to their own consequence, to have the best doctor and the cleverest lawyer in the kingdom, and especially in communities recently enriched by commerce and only dimly enlightened by education, arrogant self-assumption is very frequently successful. Pretenders whom Abernethy would have crushed under a sarcasm, flourish weapons from his armoury in the faces of the public. We lately heard a description of a certain Dr. Bouncer, thus situated, who was called in consultation to the abode of opulent Mr. Jones. Following the general practitioner in attendance into the drawing-room where the ladies of the family were assembled, the doctor rapidly divested himself of his great coat, threw it past the astonished head of the mistress of the house, to alight upon a distant chair, arranged himself in a recumbent posture upon the most comfortable-looking sofa in the room, and then first breaking the silence that had ensued upon his entrance, exclaimed, with an authoritative wave of his hand, "*Mrs. and Miss Jones, be good enough to retire.*" "Sir," said Mr. Dosey, the general practitioner, in recounting the matter on the same evening, "Sir, the way little Bouncer goes to work takes my breath away. Those ladies hurried out of the room as if it did not belong to them; and there was he, who had never seen them before, with his muddy boots on the best sofa, asking questions of me about the case, and as cool as a cucumber." Poor Dosey was so much impressed, in fact, that he insulted his best patient the very next morning; and, sad moral, lost him by doing so. Bouncer, however, knew his ground, and was secure. Mrs. Jones was a humble captive at his chariot wheels, and shortly after sang his praises to a shrewd old Scotchman. "His manner is so imposing," said the lady. "Eh, y're aboot reet there," was the dry response; "he's a vara great impostor!"

Our readers will be familiar, too, with the other extremity of the scale, the courteous and supple doctor, whose face is creased into smiles, whose speech is a succession of acquiescences, and whose patients suffer under maladies of the most profoundly curious and instructive character, causing him to feel the "deepest interest" in their respective cases, and the greatest respect for their own opinions about symptoms and their causes. Of such a man wrote Cowper, in the familiar lines:—

Dubius is such a scrupulous good man—
 Yes—you may catch him tripping if you can.
 He would not, with a peremptory tone,
 Assert the nose upon his face his own;

With hesitation admirably slow,
He humbly hopes—presumes—it may be so.

"I assure you, my dear Miss B——," we once heard a specimen of this class say to a rich old maid, "that I sat yesterday for half an hour, with my pen suspended, pondering whether I should decide upon the sixth or the seventh of a grain as the dose best suited to your state." It is frequently a matter for grave consideration among young practitioners, to which of these opposing schools they shall attach themselves at the outset of their career; and it often happens that they make the worst possible choice. Men of spirit, who might successfully carry off a tone of great decision, cultivate an artificial blandness; and men with chicken hearts, accustomed to be influenced by the pretensions or the bluster of others, carry their bluster to the side of the sick bed. Artificial blandness, moreover, is not uncommonly aided by artificial piety. We once travelled from London to the north with a young surgeon who had determined to establish himself at some town on the route, and who had made the most minute inquiries as to the religious creed which in each place it might be most to his advantage to profess. He related the results of his investigations with surpassing *naïveté*. "If I come here," he said, as the train slackened speed near to one of the stations, "I shall have to be a Methodist. They are a very strong body in the place; and of the men now in practice, four are Churchmen, one is a Romanist, and one a Baptist. Now at E——, ten miles further on, I should have to be a Catholic." It is a melancholy fact, that, in the midland and northern districts of England, and especially in the large towns, the professional connexions of inferior practitioners depend very greatly upon their respective chapels; and where there is the obvious prospect of temporal rewards attaching to certain professions, it is impossible not to suspect that such professions, when very loudly and fiercely made, may arise from motives having at least some admixture of worldliness; that they may, in a word, be nothing better than experiments in the art of rising.

Next to artificial piety, we should be disposed to think that sham science is regarded as the most effectual stepping-stone on the road of social and professional progress. The possession of a little philosophical apparatus has been the basis of reputation to many a Sir Frizzle Pumpkin in the medical world; and there are few things more charming than the babble of a certain class of patients about the attainments that the possession of such apparatus is supposed to indicate. A faith as simple as profound has ere now been pinned upon a Leyden jar or an air-pump: not to speak of a microscope, the owner of which might not be able to tell a cancer-cell from an air-bubble. Even the aquarium has not been without

its uses ; and we know of one doctor who has most energetically employed that elegant means of studying the manners and customs of subaqueous life, as a wedge by which to insinuate himself into families. Perfectly skilled in all the details of aquarium management, he sees one of the crystal cases through the window of a house by which he has to pass, but the residents in which are unknown to him. To pull up—to alight—to call—to introduce himself to the ladies—to apologize a hundred times for his intrusion—to explain that he thought he had caught a glimpse in the very beautiful aquarium in the window, of a fine specimen of the *Ægra inepta*, which he himself had often tried in vain to cultivate—to discover his singular error—to beg that he might be excused on the ground of his enthusiasm—to depart—to call again—to offer some diving spiders—to call a third time to inquire how the spiders were prospering, &c. &c. Such was the routine that has laid the foundation of at least one prosperous practice.

Of such shifts and schemes as these, and of the thousand and one tricks of the Bob Sawyer school that are daily practised, indefensible as they are on many grounds, it is hard to speak in the terms that perhaps they strictly merit. The persons who use such means of obtaining notoriety are often necessitous, and think, perhaps justly, that if they could obtain patients, they could treat them as well as their neighbours. The public are, and must remain, utterly unable to appreciate the gradations of professional ability. They argue from the general to the particular, and think that if a man be what they call "clever," he must be clever in professional matters ;—a sufficiently just inference, if only he have paid the necessary degree of attention to them. This, every doctor is of course supposed to have done, unless his mind and thoughts are notoriously given to other subjects. But the popular tests for cleverness reach only to the discovery of tact and *savoir faire*. If, therefore, a man can see his own proper line and keep to it, being bombastic if his gifts incline that way, bland and conciliating if of a weak and humble spirit ; if he can accommodate himself to the vices or the prejudices of the class into which he is thrown ; if he can ride triumphant upon the latest wave of quackery or popular delusion, can call spirits from the vasty deep, or deliver an oracular opinion concerning the verity of Darwinism ; each or all of these accomplishments will find its use in life, and will stamp the basest alloy with currency in the estimation of some section of the public. Through such dubious channels he may often procure his earliest clients, and may thus obtain an opportunity of building up a reputation of an unobjectionable character.

There is, however, an art of rising by means unmixedly base—

by artifices unmixedly contemptible. There are those who seek their elevation in the downfall of others, and who are constantly endeavouring to supplant their brethren. In London, for instance, it would not be difficult to name surgeons or physicians who, by some singular coincidence, invariably supersede the luckless practitioner who may call them in. Every particular case, of course, admits of great palliation, or even of entire explanation to every unprejudiced mind; but the point of the matter is, that in the practice of certain individuals the cases are so numerous and so similar.

Mrs. Bunny, in her third labour, was the subject of a shoulder presentation; and her medical attendant, anxious to diminish the responsibility resting upon him, suggested the co-operation of a distinguished accoucheur, who came, saw, turned, took his fee, and departed. A twelvemonth later a relative of Mrs. Bunny consulted the "great deliverer" at his house; and, having waited an hour and a half for her interview, in the company of other patients, the *Times* of yesterday, and a liberal supply of envelopes that had contained telegraphic messages, naturally exercised all her ingenuity to lengthen the brief period of time that the man of skill was ready to accord in exchange for her guinea. At her wits' end, and almost at the door of the consulting-room, she exclaimed, as if by inspiration, "You remember my cousin Mrs. Bunny, Dr. Victory, and what a terrible time she had until you came to her assistance? Well, she is expecting again!" The fine countenance of the doctor became overspread with sudden consternation; and, falling a step backwards, he exclaimed, "Is it possible?" "Dear me!" responded the lady, "you do not anticipate any danger?" "Oh no, no, no," said the learned man, recovering his self-possession, "not at all—not at all, my dear madam—not at all. Mrs. Bunny will be excellently cared for by my friend Stick-in-the-mud; and, if anything perilous should happen, why—I can soon be summoned." Off went the cousin to poor Mrs. Bunny, and assured her that Dr. Victory was quite alarmed about her. "He seemed really shocked to hear of your state, and I am sure he expects something dreadful to happen, although he would not say so. But he completely betrayed himself at first; and I am sure, dear, if I were you, I would not trust to that Mr. Stick-in-the-mud. You had much better engage Dr. Victory at the first." And so it befell.

There is a prospect, however, of a future for the medical profession, in which the various shifts and arts to which we have referred will fall gradually into desuetude. They spring, we believe, mainly from ingenuity sharpened by need, and not controlled by education. It has been the object of the medical examining boards to throw open their portals as widely as pos-

sible, to make a bridge for every druggist's assistant and every needy student, to render it possible to fulfil the letter of a curriculum of study, while really engaged in other and laborious duties, and to admit within their pale men whose reasoning powers had never been properly exercised, and whose special knowledge was of the most imperfect kind. A new era now happily dawns. The Medical Council requires some evidence of a liberal education to be given before entering upon special studies at all, and the result will be that large classes from which the profession has been recruited in former times will for the future be excluded from its ranks. We congratulate ourselves much—we congratulate the public more. We look forward to a time when the profession of medicine, as of the Church or the Bar, will comprise only men of education and of knowledge, men who are aware that their duties in life are twofold, to *know* and to *do*. In these simple words the whole "art of rising" ought to be expressed; and is expressed, even now, excepting for those who have entered upon the battle of life with means inadequate to their requirements. For all others, to know their work thoroughly, and to do it well, constitute a sure passport to success; that is to say, to universal respect and moderate competence. Even in competition with the most unscrupulous, the essentials we have indicated must eventually secure the public confidence; and the honest doctor, who has studied his work thoroughly, and who does it well, need have but few anxieties with regard to his professional career. It is his privilege to stand aloof from, and above, party cabals and quarrels, to shun tricks and contrivances, whether for his own exaltation or for the downfall of his neighbour, and neither to damn with faint praise nor to criticize with envious censure those who may be placed in a position of rivalry to himself. We know many such men even now, honest, skilful, upright, laborious, sincere, carrying charity into their daily path of duty, using for good the manifold opportunities of their vocation, and reaping a rich reward in the approval of their own consciences, and the esteem of their fellow-citizens.

ART. XV. CELLULAR PATHOLOGY.*

DR. CHANCE has done excellent service to the medical literature of this country by his admirable translation of Professor Virchow's work on *Cellular Pathology*. This important work (dedicated by its distinguished author to Professor Goodsir) consists of a series of lectures, delivered in the early part of 1858, before the medical public of Berlin, in the new Pathological Institute of the University of that city. The object chiefly aimed at in these lectures, the learned Professor states, in the preface to the first edition of the book,—

“— was to furnish a clear and connected explanation of those facts upon which, according to his ideas, the theory of life must now be based, and out of which, also, the science of pathology has now to be constructed. They were more particularly intended as an attempt to offer, in a better arranged form than had hitherto been done, a view of the cellular nature of all vital processes, both physiological and pathological, animal and vegetable, so as distinctly to set forth what even the people have long been dimly conscious of, namely, the unity of life in all organized beings, in opposition to the one-sided humoral and neuristical (solidistic) tendencies which have been transmitted from the mythical days of antiquity to our own times, and at the same time to contrast with the equally one-sided interpretations of a grossly mechanical and chemical bias, the more delicate mechanism of the cell.” (p. vii.)

After briefly setting forth the manner in which he has endeavoured to effect this object, the Professor further expresses a hope, that what he has offered “may not be taken for more than it is intended to be,” and adds—

“Those who have found leisure enough to keep up their knowledge by reading the current medical literature, will find but little that is new in these lectures. The rest will not, by reading them, be spared the trouble of being obliged to study the subjects, which are here only briefly touched upon, more closely in the special histological, physiological, and pathological works. But they will at least be in possession of a summary of the discoveries which are the most important as far as the cellular theory is concerned, and they will easily be able to add their more accurate study of the individual subjects to the connected exposition which I here give them of the whole. Nay, this very

* *Cellular Pathology as based upon Physiological and Pathological Histology.* By Rudolf Virchow, Public Professor in Ordinary of Pathological Anatomy, General Pathology and Therapeutics, in the University of Berlin, &c. Translated from the Second Edition of the Original, by Frank Chance, B.A., M.B., Cantab., L.R.C.P., Physician to the Blenheim Free Dispensary and Infirmary. 8vo. London: Churchill. 1860.

exposition may perhaps afford a direct stimulus for such more accurate study; and if it do but this, it will have done enough." (p. xi.)

Again, in the preface to the second edition of the work, the author writes—

"The book will have fulfilled its object, if it assists in the propagation, not of cellular pathology, but, in general only, of independent thought and investigation." (p. xiv.)

In the introduction to the first lecture Professor Virchow throws still more light upon the feelings which governed him in the delivery of the course. He there states that he should "make the attempt to lay before his audience in a more succinct manner the development which he himself, and, as he thought, medical science also, had passed through in the course of the last fifteen years."

The explicit statement of the object, and philosophical estimate of the probable utility, of the work, thus given by the author, are the best indications that can be afforded of its scope and tendency, and it rests for us to sketch the leading characteristics of the theoretical speculations developed in it.

In the application of histology to pathology, "the chief point," writes Professor Virchow, "is to obtain a recognition of the fact, that the cell is really the ultimate morphological element in which there is any manifestation of life, and that we must not transfer the seat of real action to any point beyond the cell." (p. 3.) As a preliminary and essential step towards this end, it is requisite, first of all, that we should have a clear idea of what constitutes a cell. Thus, our author writes:—

"The comparison between animal and vegetable cells, which we certainly cannot avoid making, is in general inadmissible, because in most animal tissues no formed elements are found which can be considered as the full equivalents of vegetable cells in the old signification of the word; and because, in particular, the cellulose membrane of vegetable cells does not correspond to the membrane of animal ones, and between this, as containing nitrogen, and the former, as destitute of it, no typical distinction is presented. On the contrary, in both cases we meet with a body essentially of a nitrogenous nature, and, on the whole, similar in composition. The so-called membrane of the vegetable cell is only met with in a few animal tissues, as, for example, in cartilage; the ordinary membrane of the animal cell corresponds, as I showed as far back as 1857, to the primordial utricle of the vegetable cell. It is only when we adhere to this view of the matter, when we separate from the cell all that has been added to it by an after-development, that we obtain a simple, homogeneous, extremely monotonous structure, recurring with extraordinary constancy in living organisms. But just this very constancy forms the best criterion of our having before us in this structure one of those really elementary

bodies, to be built up of which is eminently characteristic of every living thing—without the pre-existence of which no living forms arise, and to which the continuance and the maintenance of life is intimately attached. Only since our idea of a cell has assumed this severe form—and I am somewhat proud of having always, in spite of the reproach of pedantry, firmly adhered to it—only since that time can it be said that a simple form has been obtained which we can everywhere again expect to find, and which, though different in size and external shape, is yet always identical in its essential constituents.” (p. 7.)

In such a simple cell dissimilar elements can be distinguished, to wit, (1) a *nucleus*, and, in addition to the nucleus, (2), certain *contents*.

Of the *nucleus* it may be said generally, that “as long as the life of the cell has not been brought to a close, as long as cells contain elements still endowed with vital power, the nucleus maintains a very nearly constant form.” Within the nucleus a so-called *nucleolus* is very constantly distinguished in completely developed cells. This structure, however, would not seem to be essential. It has as yet entirely escaped detection in many younger forms, and it would seem “to mark a higher degree of development in the cell.”

It is highly probable, Professor Virchow states—

“That the nucleus plays an extremely important part within the cell—a part, I will here at once remark, less connected with the function and specific office of the cell than with its maintenance and multiplication as a living part. The specific (in a narrower sense animal) function, is most distinctly manifested in muscles, nerves, and gland cells; the peculiar actions of which—contraction, sensation, and secretion—appear to be connected in no direct manner with the nuclei; but that, whilst fulfilling all its functions, the element remains an element, that it is not annihilated nor destroyed by its continual activity—this seems essentially to depend upon the action of the nucleus. All those cellular formations which lose their nucleus have a more transitory existence; they perish, they disappear, they die away or break up. A human blood-corpusele, for example, is a cell without a nucleus; it possesses an external membrane and red contents; but herewith the tale of its constituents, so far as we can make them out, is told; and whatever has been recounted concerning a nucleus in blood-cells, has had its foundation in delusive appearances, which certainly very easily can be, and frequently are, occasioned by the production of little irregularities upon the surface.” (p. 10.)

Upon the varying *contents* of the cell, apart from the nucleus, the special peculiarities which individual cells exhibit, under particular circumstances, are in general dependent. “It is not the constituents which we have hitherto considered (membrane and nucleus), but the contents (or else the masses of matter deposited

without the cell, *intercellular*) which give rise to the functional (physiological) differences of tissues."

"For us," writes our author, "it is essential to know that in the most various tissues these constituents, which in some measure represent the cell in its abstract form, the nucleus and membrane, occur with great constancy, and that by their combination a simple element is obtained, which, throughout the whole series of living vegetable and animal forms, however different they may be externally, however much their internal composition may be subjected to change, presents us with a structure of quite a peculiar conformation, as a definite basis for all the phenomena of life." (p. 13.)

According to Professor Virchow, this is "the only possible starting-point for all biological doctrines;" and he further argues that, "if a definite correspondence in elementary form pervades the whole series of all living beings, and if in this series something else which might be placed in the stead of the cell be in vain sought for, then must every more highly-developed organism, whether vegetable or animal, necessarily, above all, be regarded as a progressive total, made up of larger or smaller numbers of similar or dissimilar cells." As other corollaries, it is asserted that, "*Every animal presents itself as a sum of vital unities*, every one of which manifests all the characteristics of life," and that "a so-called individual always represents a kind of social arrangements of parts, an arrangement of a social kind, in which a number of individual existences are mutually dependent, but in such a way that every element has its own special action, and, even though it derives its stimulus to activity from other parts, yet alone effects the actual performance of its duties." (p. 14.)

In accordance with this view Professor Virchow has considered it well to "portion out the body into *cell-territories*." In the animal body a peculiarity exists which is rarely found in vegetables, that is to say, the development, in large masses, of so-called *intercellular substance*. Now pathological observation has led our author to the conclusion that the action of cells upon the intermediate substance is definite, and bounded within certain limits—given districts of intercellular matter being ruled over and dependent upon given cells. "But," he continues—

"— there are simple tissues which are composed entirely of cells, cell lying close to cell. In these there can be no difficulty with regard to the boundaries of the individual cells; yet it is necessary that I should call your attention to the fact that, in this case, too, every individual cell may run its own peculiar course, may undergo its own peculiar changes, without the fate of the cell lying next it being necessarily linked with its own. In other tissues, on the contrary, in which we find intermediate substance, every cell, in addition to its own contents, has the superintendence of a certain quantity of matter

external to it, and this shares in its changes, nay, is frequently affected even earlier than the interior of the cell, which is rendered more secure by its situation than the external intercellular matter. Finally, there is a third series of tissues, in which the elements are more intimately connected with one another. A stellate cell, for example, may anastomose with a similar one, and in this way a reticular arrangement may be produced similar to that which we see in capillary vessels and other analogous structures. In this case it might be supposed that the whole series was ruled by something which lay who knows how far off; but upon more accurate investigation, it turns out that even in this chainwork of cells a certain independence of the individual members prevails, and that this independence evinces itself by single cells undergoing, in consequence of certain external or internal influences, certain changes confined to their own limits, and not necessarily participated in by the cells immediately adjoining.

"That which I have now laid before you will be sufficient to show you in what way I consider it necessary to trace pathological facts to their origin in known histological elements; why, for example, I am not satisfied with talking about an action of the vessels, or an action of the nerves, but why I consider it necessary to bestow attention upon the great number of minute parts which really constitute the chief mass of the substance of the body, as well as upon the vessels and nerves. It is not enough that, as has for a long time been the case, the muscles should be singled out as being the only active elements; within the great remainder, which is generally regarded as an *inert mass*, there is in addition an enormous number of active parts to be met with.

"Amid the development which medicine has undergone up to the present time, we find the dispute between the humoral and solidistic schools of olden times still maintained. The humoral schools have generally had the greatest success, because they have offered the most convenient explanation, and, in fact, the most plausible interpretation of morbid processes. We may say that nearly all successful practical, and noted hospital physicians have had more or less humoropathological tendencies; aye, and these have become so popular, that it is extremely difficult for any physician to free himself from them. The solido-pathological views have been rather the hobby of speculative inquirers, and have had their origin not so much in the immediate requirements of pathology, as in physiological and philosophical, and even in religious speculations. They have been forced to do violence to facts, both in anatomy and physiology, and have therefore never become very widely diffused. According to my notions the basis of both doctrines is an incomplete one; I do not say a false one, because it is really only false in its exclusiveness; it must be reduced within certain limits, and we must remember that, besides vessels and blood, besides nerves and nervous centres, other things exist which are not a mere theatre (*Substrat*) for the action of the nerves and blood, upon which these play their pranks." (pp. 15, 17.)

After illustrating more fully the essential correspondence which

exists between pathological and physiological cells, whether large or small, Professor Virchow enters upon the consideration of physiological tissues. And first he dwells briefly upon the development of cells. Setting aside as no longer tenable the doctrines that living elements, or cells, are "produced from parts previously destitute of shape, such as formative fluids, or matters (*plastic matter, blastema, cytoblastema*)," he asserts that, "even in pathology, we can now go so far as to establish, as a general principle, *that no development of any kind begins de novo, and consequently as to reject the theory of equivocal (spontaneous) generation just as much in the history of the development of individual parts as we do in that of entire organisms. . . .* When a cell arises, there a cell must have previously existed (*omnis cellula e cellula*), just as an animal can spring only from an animal, a plant only from a plant." (p. 27.) Hence he arrives at "an eternal law of *continuous development*," whether as applied to entire organisms, vegetable or animal, or the essential constituents of the same.

Now, the normal tissues are susceptible of a very simple classification, dependent upon marked characteristics. There are tissues consisting solely of cells, cell lying close to cell—cellular tissue in the modern sense of the word. To this class belong the epithelial tissues. There are other tissues in which one cell is separated from another by an intermediate substance—the connective tissues. Finally, there is a third class of tissues in which the cells have attained higher and specific forms of development. To this class belong "the nervous and muscular systems, the vessels and the blood." These different classes of tissues having been submitted to a general examination, the question arises how the pathological tissues in their turn comport themselves. To this Professor Virchow replies, that "every pathological structure has a physiological prototype, and that no form of morbid growth arises which cannot in its elements be traced back to some modes which had previously maintained an independent existence in the economy." (p. 60.)

In the development of this proposition it is shown that pathological structures may be classified in a manner similar to that which had already been attempted with physiological tissues. Further, as a consequence of this simple view of the matter, the doctrine of *heterology* of morbid products necessarily falls to the ground. "There is no other kind of heterology of morbid structures than the abnormal manner in which they arise, and this abnormality consists either in the production of a structure at a point where it has no business, or at a time when it ought not to be produced, or to an extent which is at variance with the typical formation of the body." (p. 63.) Again, we are taught, as arising out of this view of the subject, that "no attention is therefore paid, in considering the question of the heterologous or homologous

nature of a new formation, to the composition of the structure as such, but only to the relations which subsist between it and the soil from which it springs. Heterology, in this sense, designates the difference of development in the new, as contrasted with the old tissue; or, as we are wont to say, a *degeneration*, a deviation from, typical conformation." (p. 67.) It is manifest that, on this view, the doctrine which declares every pathological new formation to be innocuous which exhibits a reproduction of pre-existing and familiar tissues entirely falls to the ground.

The further development of Professor Virchow's opinions, ranging over the greater part of the pathological field, we shall not attempt to follow, notwithstanding that in so doing we leave not only the greater bulk of his work unnoticed, but also those portions of it which will prove most probably of the greatest interest and moment to the practical pathologist and physician. The nature of his argument renders a profusion of histological and microscopical details necessary for its right comprehension. These cannot well be brought within the compass of a review, or be abstracted without risk to the integrity of the opinions they are designed to support. We have already attempted to set forth the main features of his theoretical speculations, adhering as closely as practicable to the language of the author. We have also briefly indicated the important bearing of these speculations upon one or two pathological doctrines in vogue. To these examples we may fittingly add one or two others taken almost at random from the work, and well calculated, we think, to whet the appetites of our readers for the book itself.

In discussing the influence of the vessels upon nutrition, Professor Virchow writes:—

‘If we cut off or diminish the supply of nutritive matter, we must of course prevent the part from absorbing more than its wont, but, *vice versâ*, we cannot, by offering it a larger quantity of nutritive material, straightway compel it to take up more than it did; these are two entirely independent cases. However apt one may be to conclude (and however much I may be disposed to allow, that at the first glance there is something very plausible in such a conclusion) that, from the favourable effect which the cutting off of the supply of blood has in putting a stop to a process which arose from an increase of it, the process depending upon this increased supply, yet I am of opinion that the practical fact cannot be interpreted in this way. It is not so much an increase of quantity, either in the blood as a whole, or in that portion of it contained in an individual part, which is required in order that a like increase should forthwith take place in the nutrition of that part, or of the whole body, as that, in my opinion, particular conditions should obtain in the tissues (irritation) altering the nature of their attraction for the constituents of the blood, or that particular matters should be present in the blood (specific substances), upon which

definite parts of the tissues are able to exercise a particular attraction." (pp. 125-6.)

And again he writes, after referring to the specific action of the great secreting organs:—

"Now I demand for cellular pathology nothing more than this view, which must be admitted to be true in the case of the large secreting organs, be extended also to the smaller organs and smaller elements; and that, for example, an epidermis-cell, a lens-fibre, or a cartilage-cell be, to a certain extent, admitted to possess the power of deriving from the vessels nearest to them (not always indeed directly, but often by transmission from a distance), in accordance with their several special requirements, certain quantities of material; and again that, after they have taken this material up, they be held to be capable of subjecting it to further changes within themselves, and this in such a manner that they either derive therefrom new matter for their own development; or that the substances accumulate in their interior, without their reaping any immediate benefit from it; or finally that, after this imbibition of material, even decay may arise in their structure and their dissolution ensue. At all events, it seems necessary to me that great prominence should be assigned to this *specific action of the elements of tissues*, in opposition to the specific action of the vessels, and that in studying local processes we should principally devote ourselves to the investigation of processes of this nature." (p. 129.)

Further we read—

"The greater number of the humoro-pathological doctrines are based upon the supposition, that certain changes which have taken place in the blood are more or less persistent; and just in the very instance where these doctrines have practically exercised the greatest influence, in the theory, namely, of chronic dyscrasiæ, it is usually conceived that the change is continuous, and that by inheritance peculiar alterations in the blood may be transmitted from generation to generation, and be perpetuated.

"This is, I think, the fundamental mistake of the humoralists, the real hinge upon which their errors turn. Not that I doubt at all that a change in the composition of the blood may pertinaciously continue, or that it may propagate itself from generation to generation; but I do not believe that it can be propagated *in the blood itself* and there persist, and that the blood is the real seat of the dyscrasia.

"My cellulo-pathological views differ from the humoro-pathological ones essentially in this, that I do not regard the blood as a permanent tissue, in itself independent, regenerating and propagating itself out of itself, but as in a state of constant dependence upon other parts. We need only apply the same conclusions which are universally admitted to be true as regards the dependence of the blood upon the absorption of new nutritive matters from the stomach, to the tissues of the body themselves also. When the drunkard's dyscrasia is spoken of, nobody of course imagines that every one who has once been drunk labours under a permanent alcoholic dyscrasia; but the common opinion is that, when continually fresh quantities of alcohol are ingested, con-

tinually fresh changes also declare themselves in the blood, so that its altered state must continue as long as the supply of fresh noxious matters takes place, or as, in consequence of a previous supply, individual organs remain in a diseased condition. If no more alcohol be ingested, if the organs which had been injured by the previous indulgence in it be restored to their normal condition, there is no doubt but that the dyscrasia will therewith terminate. This example, applied to the history of all the remaining dyscrasiæ, elucidates in a very simple manner the proposition, that *every dyscrasia is dependent upon a permanent supply of noxious ingredients from certain sources*. As a continual ingestion of injurious articles of food is capable of producing a permanently faulty composition of the blood, in like manner persistent disease in a definite organ is able to furnish the blood with a continual supply of morbid materials.

"The essential point, therefore, is to search for the *local origins* of the different dyscrasiæ, to discover the definite tissues or organs from which this derangement in the constitution of the blood proceeds." (pp. 130-1.)

With these illustrations we close this most valuable work. As the author himself states, it contains "no arbitrary settlement of questions, nothing systematical or dogmatical;" hence no juster criticism can be passed upon it, none which redounds more to the honour of its distinguished author, than that the work is in an eminent degree calculated to prove (as he hoped it would prove) "an active ferment to the labourers in the so very various fields of medical science and practice."

ART. XVI.—MEDICAL GOSSIP.

THE recently published volumes, in which Professor Owen has given to the world the posthumous manuscripts of John Hunter, are fruitful sources of medical gossip. They have more than a merely literary interest. They recal the whole of that strange history which attached to the literary remains of Hunter. Although known to many in its main features, the lapse of time has effaced the recollection and the details of that singular and chequered story, and to the younger men it is only dimly and vaguely known. The whole chain of events is drawn before the eye by this publication, which adds some last and most important links. The manuscript remains of Hunter included a magnificent body of notes on the Animal and Vegetable Kingdom, physiological observations, records of many hundred dissections, scattered materials for great works on Comparative Anatomy, on Natural History, on Psychology, Geology, and on special subjects, such as the History of Monsters, and the Struc-

ture and Composition of Animal bodies. Until the year 1800 the Hunterian collections and manuscripts were the property of John Hunter's executors. At the beginning of the year 1800 the collections having been purchased by Parliament, were transferred to the custody of the Royal College of Surgeons, then the Corporation of Surgeons. The manuscripts were, by Sir Everard Home's order, carted away to his house, and were not allowed to accompany the collections. They consisted of masses of original notes, which Mr. Hunter had laboriously written or dictated to Mr. Clift and Mr. Bell, his amanuenses, during thirty years of his life. Here were the recorded notes of his dissections of many hundreds of mammalia, birds, reptiles, fishes, insects, and invertebrate animals. All these Sir Everard Home transferred to his house in the year 1800. He kept them there, and continued to publish papers in the *Transactions of the Royal Society*, and subsequently a work in four volumes on Comparative Anatomy, in which he ran over the whole ground which Hunter had arduously cultivated during his life. Then in 1823, when the last sheets of the fourth volume of his book were corrected, he destroyed these manuscripts by fire, and in doing so he nearly set fire to his house. This conduct he vindicated before a Committee of the House of Commons, by asserting that these papers were desired by Hunter to be shielded from the public eye, and that he having used them as far as possible for the benefit of the collections in the Museum of the College of Surgeons, had felt it his duty to destroy them. A more sinister motive has always been more than suspected. It is now painfully but providentially made manifest.

The reverent care of Clift, the curator of Hunter's museum in Leicester Fields, had led him, during the six years after Hunter's death, when he kept long watch over the collection in Leicester Fields, and when "he had, as he might say, no other books to read," to make careful copies of almost one-half of these manuscripts, and copious extracts from others. He could not bring himself during his life, or during the life of his unworthy relative, Sir Everard Home, to publish these precious transcripts, which Home in his published works pillaged wholesale. But he carefully used them for the illustration of the Hunterian collections; and, scattered through all the volumes of the catalogues, are precious fragments of transcripts which he furnished to Professor Owen, in elucidation of intricate series of preparations. Finally, at his death he bequeathed these MSS., on which he had spent much time and care, to Professor Owen. That distinguished anatomist, who has devoted so many years of his life to the study, the development, and the exposition of the Hunterian collections, has now given these valuable papers to the world, enriched with notes minutely referring each paragraph to the preparation, when existing, to which it relates, carefully and

judiciously annotating the rough manuscripts where actually necessary, and, in every case, determining, with the marvellous analytical skill which he eminently possesses, the species and genus of the subjects from the rough indications of these notes. One only of the posthumous papers is wanting here. It is that on Fossils. The private history of this manuscript is hardly less scandalous than that of the others. This MS. was not destroyed by Sir Everard Home, and was presented by his son to the College in April, 1839. Professor Owen had cognizance of this paper, and, in February, 1855, suggested to the Council of the College of Surgeons that it should be published with the catalogue of Hunterian fossils then in preparation. In March, 1855, he delivered three lectures on the Hunterian fossils, in which he read this MS. in the theatre of the College, and elegantly expounded its nature and importance. All this produced no effect on the Council. In October, 1859, Professor Owen being employed in preparing the press copies of Mr. Clift's manuscript for the present volumes, applied to the Council for permission to include that MS. in the collection. Strange, indeed, it is to have to say, that permission was refused. But the long-neglected manuscript was forthwith hurried to the press, and, having been edited with a lamentable ignorance and inefficiency, was published within eight weeks. The editor, who had done nothing to elucidate the text, did, however, contrive to inflict an additional disgrace on the College; for, in the preface, he falsely asserted that the MS. had not been brought to notice by the Hunterian Professor (Mr. Owen) until after the publication of the last volume of the Catalogue of Fossils, when he had unexpectedly (in 1856) read it from the chair. Thus, by postponing for a year the date of Professor Owen's lecture, he gave colour to an insinuation that the Hunterian Professor had been guilty of suppressing for a time this manuscript. The indignant protest of Professor Owen, when challenged by the *Lancet* as to the truth of this charge, will be remembered. Its consequence was, that the Council of the College had to retract the charge, and to expunge the odious falsehood from the printed preface. It has been the fate of these papers to be treated by those who have best profited by the fertility and greatness of Hunter, with the most unexampled neglect, perfidy, and illiberal meanness. It has, on the other hand, been their fortune to have been studied and appreciated by true men, such as Clift and Owen, who revered Hunter, who entered in a kindred spirit into his labours, and who have finally rescued them from destruction and from oblivion by their reverent and devoted care. This chapter of literary history closes with the publication of the present volumes, and the scientific, medical, and literary world will feel that Mr. Owen has, in no slight degree, added to his claims on their respect and gratitude by the

part which he has played in endowing them with this admirable edition of the posthumous papers of the great English naturalist and surgeon.

The faults of individual members of the Council, of course, can never affect the honour of the whole body, and these facts make a sad and pitiful contrast with the eloquent lip-worship which Mr. Coulson, a few weeks since, offered to the memory of Hunter, in the philosophic "Hunterian Oration," which he delivered in the theatre of the College.

The lamented death of Dr. Baly, the learned, upright, and philosophic attendant on the Queen, has rendered vacant during the quarter one of the highest appointments which a physician can, in this country, be called to fill. Speculation as to his successor pointed to Dr. Acland, of Oxford, who had accompanied the Prince of Wales to Canada, Dr. T. K. Chambers, who had acted as physician to the Prince of Wales on his visit to Rome, and Dr. Gull. It is believed that the appointment was actually offered to Dr. Acland, whose high accomplishments, great erudition, and perfect knowledge of the world in all its best phases, have procured for him well-deserved favour at Court. But as Regius Professor at a great seat of learning, and possessing a freedom and an influence which Court attendance could only shackle and diminish, that physician had little to gain by the exchange. The appointment of Dr. Jenner was somewhat unexpected. But it is an appointment with which the profession are, and have reason to be, well pleased. Dr. Jenner's reputation is founded upon long and legitimate labour in the field of strictly medical observation, which he has pursued with quiet but undeviating energy. His clinical labours are known throughout Europe, and his appointment is a tribute to quiet worth and laborious research. The appointment was, of course, subject to the advice of Sir James Clark, whose failing strength has rendered it necessary. We rejoice to hear that his present condition is one of improved health.

It were greatly to be wished, that of Sir Benjamin Brodie, his colleague in courtly office, words of cheerful import might also be spoken. But the sight of that distinguished chieftain of surgery is still veiled with a thick mist, which successive operations for glaucoma and cataract, following each other at short intervals, have not served to dispel. The painful circumstances attending these operations will be regretted by all, and scarcely less so the indelicacy with which rumours and counter rumours, and puffs and counter puffs were publicly circulated, more or less at variance with truth, and intended apparently to protect or assail the reputation of the operator rather than to allay the useless fears or encourage the just hopes of the friends of the great surgeon.

The ill-health and advanced age of Mr. Lloyd, one of the

veteran and perennial surgeons of St. Bartholomew's Hospital, has made a vacancy in the staff at that institution. Mr. Wormald will be elected in his place. We behold here, therefore, the spectacle of a grey-haired and distinguished man, who, after thirty years of hospital service as an assistant, is now, at the age of threescore, advanced for the first time to the post of surgeon. In the autumn of his life, and at a time when his reputation is established, when his prime is already past, when his energies are damped, and when, in all professions and employments, men look to enjoy the fruits of a life of labour, he is invited to advance the career of usefulness open to a man newly appointed to the care of beds in a great hospital, and he is told to begin when he should be already at the end.

At the same moment the committee of another metropolitan hospital, St. Mary's, Paddington, have decided that at that institution thenceforth, the surgeon in charge of in-patients shall not hold office for a longer term than fifteen years, or after sixty years of age. This provision is in accordance with the dictates of justice and wisdom. After some ten years or more of service as surgeon in charge of out-patients, and fifteen as surgeon in charge of in-patients, every reasonable man must feel that he has done all for the hospital which can be expected from him, and that the hospital has done all for him which he ought to expect from it. The tenacity of the veterans who cling to their accustomed haunts, and grasp the reins until they fairly fall from their feeble hands, is comprehensible and is pardonable, but it is impolitic and unjust.

ART. XVII.—LITERARY GOSSIP AND RECORD.

A CURRENT bibliography is a desideratum in English medical literature. Its utility would be great. To the reader, the medical scholar, and the librarian it would be a most welcome aid, and its after uses would be as valuable as its present. He alone who has had to hunt up some details in past medical history, general or special, can appreciate the actual value of a trustworthy bibliography. What days, and weeks, and months of profitless labour would have been saved to many a student if he could always have commanded one! And what a gain to medical science! A contemporary bibliography would at once have made apparent every source of information open to the student, and there is no branch of medicine which would not have gained in precision and completeness of detail, in all that relates to the history of its development and progress. Moreover, a current bibliography would prove the best and most certain index to the intellectual workings of a period.

Not the less important would be its present uses. Without one, the knowledge even of those best situated for ascertaining the number, nature, and character of the books published at any given time is imperfect, while those who are not so situated are often left most egregiously in the lurch. A current bibliography, therefore, would be the surest guide to the librarians of our great medical libraries, and would at the same time fill up a very serious hiatus in those libraries. It is, perhaps, not to be desired (although we are somewhat doubtful upon this point) that these should have placed upon their shelves every English medical work published, good, bad, or indifferent. There must doubtless be some restriction in expenditure on the one hand, and on the other, the National Library affords a refuge for all works, irrespective of character. But in the medical libraries it would certainly be no small gain if there could always be found a bibliographical record, so that at any moment the titles and authorship of books not upon the shelves could be ascertained, and thus reference facilitated to the catalogues of the National Library, and any work readily traced out, which, not having been purchased at the time of publication, it might subsequently become an advantage to obtain.

To the literary medical man, particularly when at a distance from the great libraries, the utility of a current bibliography is obvious, enabling him, as it would, to maintain an accurate knowledge of the works issuing from the medical press.

It may be presumed that the *trade* value of a current bibliography would be of less importance than its literary, or we should have had one long ago. Hence, all the more credit is due to a publisher, who, seeing the advantages which would arise to the profession from a bibliography, seeks to supply the want. Now, thanks to the enterprise of Mr. J. W. Davies (our own publisher), we hope soon to be enabled to announce to the profession the publication of a trustworthy current bibliography. He has had the project some time in contemplation, and he hopes soon, we believe, to mature it.

The difficulties are by no means small in carrying out such a scheme, as we know from bitter experience. For we propose, in this and future numbers of our journal, to print a list of the medical books and pamphlets published during the preceding quarter. We have experienced no little difficulty, however, in obtaining either a complete list or the complete titles of works published. The difficulty has been especially great in respect of pamphlets. These *enfants perdus* of authors would seem chiefly to fall from the press still-born. Whether the authors or the publishers are most in fault for this sad ending we shall not presume to judge. It is certain, however, that pamphlets form a

most interesting item in the literary history of a period, and that they often contain much valuable matter not given to the world in any other form; hence it is important that, if possible, a permanent record of their publication should be preserved. We appeal, therefore, to our readers to assist us in this matter, and to help us in rectifying such omissions as may occur from time to time in our bibliographical list.

OUR LIBRARY TABLE.

The Forms, Complications, Causes, Prevention, and Treatment of Consumption and Bronchitis, comprising also the Causes and Prevention of Scrofula. By JAMES COPLAND, M.D., F.R.S., F.R.C.S., &c. (Longman).—In this work the valuable treatises on Pulmonary and Laryngeal Consumption, which originally appeared in the author's *Dictionary of Practical Medicine*, are republished with considerable additions. The treatise on Bronchitis is to all intents and purposes a new one. Dr. Copland's writings and their great value are too well known to the profession to need any critical comment from the reviewer. If a special indication of the peculiar importance of the foregoing work be necessary, it is best derived from the following prefatory observations of the author:—

“In the treatises on the above important diseases I have endeavoured to assign with precision the several forms and states they present, and with due reference to the conditions of vital force (of vital energy, power, or endowment). This force, in its various and ever-varying manifestations, throughout the general systems and special organs, animal and organic, of the body, has been made, in connexion with the states of vascular action, the basis of therapeutical indications for the diseases comprised in this work, conformably with the principles of pathology and medical practice adopted and developed in my *Dictionary of Practical Medicine*. While discussing the pathology and treatment of Consumption and Bronchitis in the present publication, not only the conditions of vascular action and of the circulating fluids, but also the manifestations of vital force or power by which these conditions are influenced, developed, and controlled, are considered as fully as the difficulty of these subjects permit; for in actual practice the successful treatment of these diseases chiefly depends upon a correct estimate of these most important pathological conditions. During the last half century physicians have had their minds pre-occupied, and their attention carried away, by the recognition of changes of structure and of palpable organic alterations, from a due estimation of those conditions of vital force, of vascular action, and of the circulating fluids, which constitute the essential principles of disease, which chiefly engaged the deepest consideration of their predecessors, and which guided them to the adoption of appropriate indications and means of cure, and to practical results at least as successful as those achieved by the modern pathologist.”

Infant Feeding and its Influence on Life, or the Causes and Prevention of Infant Mortality. By C. H. F. ROUTH, M.D., M.R.C.S.L., M.R.C.S., Physician to the Samaritan Free Hospital for Women and Children. 1860 (Churchill).—This work, we have little doubt, will prove very acceptable both to the profession and the public. The question of Infant Mortality has of late, thanks to the influence exercised by the Social Science Association, been brought very prominently

into notice. It is now pretty generally admitted that the high rate of death, too commonly found to prevail among infants, is a subject involving questions not merely of medical but of great public interest. Dr. Routh, in this work, has examined these questions in their most important bearings, and with particular reference to the influence of *improper feeding*, as a cause of mortality among children of tender age. He shows by interesting statistical data the baneful effects of this cause upon infant life; and he discusses at large the principles which should govern, and the right method of carrying out, infant feeding. Those chapters of the work which refer to the employment of wet-nurses, and the indirect influence of wet-nursing upon infant mortality, will be read with great interest. For the rest, the practical value of the work is of very high grade, and we heartily commend it to the notice of the profession. The following extract will show the interesting fashion in which Dr. Routh deals with his subject:—

“The whole analogy of comparative anatomy proves that all young animals require animal food for some time after birth, because this, or some adventitious animal structure, is generally supplied by the parent. The infant itself is so anatomically and physiologically made as to be capable of digesting animal food only.

“In many species of mollusca, and especially in gasteropoda, in many insects, and among the batrachian reptiles, the mother produces, together with the egg, what is called a nidamentum, which nourishes it for some time after its birth. Certain insects even feed upon the external envelopes which surround them, as in the case of the *stratismys chameleon*.

“The yellow substance which surrounds the abdominal parietes in some animals, or which is enclosed in the central abdominal cavity, is an auxiliary of this kind. Its presence explains the fact that spiders and snakes, for instance, remain some time after birth without requiring any other kind of food. The raw food which the greater number of birds give to their young is exclusively animal; hence the more readily obtainable and digestible. The northern ducks and the petrels, with their nests situated on high rocks near the sea, easily procure this food, and they always return to their nests richly laden with fish. The sparrows nourish their young with insects and worms, which they find everywhere in abundance; and hence certain rapacious birds, which require a greater amount of animal food for their young, become at the breeding season particularly audacious in order to procure it.

“Some of the sparrow and crow tribe bring the nourishment in their beaks, emptying it into those of their young. The rapacious birds, on the contrary, bring it in their claws, place it before their young, and tear it in small pieces for them. The heron and the pelican bring the fish in the pharynx, which is dilated to a large pouch below the bill; and the pelican applying its lower jaw against its own breast, allows its young to eat out of this pocket as out of a plate. Among some species of vultures and dark-winged eagles, the crop seems to serve as a reservoir for the food intended for the young. Approximating to a higher degree of maternal co-operation, the female does not give nourishment to her young till she has in part digested and assimilated it. The bees and wasps are of this class, and swallow some pollen, and then disgorge it mixed with honey. Among pigeons, the greater number of *grallatores*, some *palmipedes*, and many sparrows, the mucous membrane of the œsophagus is dilated into a crop, well supplied with vessels, into which the grain which is difficult to digest is first conveyed, and then softened under the chemical influence of a fluid analogous to the gastric juice of the stomach. When half-digested, and converted into a kind of chyme, it is subsequently disgorged into

the beak of their young. This modified chyme it is which is popularly called pigeon's *milk*. The male assists in this operation as well as the female. Finally, in mammalia we arrive at the production exclusively by the mother, of milk, which bears in its composition considerable resemblance to the diluted yolk of egg, and in some respects to the nidamentum. It will be seen from the preceding review that the food which is required by the young is essentially animal; and in those cases even where the birds themselves are granivorous, or vegetable feeders, they either supply their young with animal food exclusively, or else with vegetable food so semi-digested in, or so intermixed with, the animal fluids, that for all purposes it may be regarded as animal food.

"Gradually as the young animal becomes older, this exclusive dependence upon the maternal supply ceases. Among pigeons, for instance, after three days the young bird begins to partake of other food also. The reindeer, at the end of some days, begins to eat grass and lichens; and the calf in about three weeks can no longer live exclusively on its mother's milk, but requires other food. Still the dependence of young animals upon the food which they directly obtain from the mother in the natural state, is very close. In the case of the *simia rhesus*, that animal attaches itself to its mother's nipple, and remains in this position for fifteen days, in sleeping as well as waking, never leaving one breast but to attach itself to the other. To endeavour, therefore, to nourish any young animal exclusively on vegetable food, is contrary to the entire law of nature, and especially so in man, where the parental relations are so much closer, and maintained for so much longer a period." (pp. 132-5.)

On the Origin of Species by means of Organic Affinity. By H. FREKE, A.B., M.B., M.D., T.C.D., M.R.I.A., &c. (Longman.)—We dare not suffer ourselves to be seduced into those broad paths of philosophical speculation in which Dr. Freke journeys. The following extract from the preface to his work may, however, be quoted as an index of its character:—

"I cannot refrain from expressing the great satisfaction I have felt on recognising a coincidence between one of the ablest living naturalists and myself upon *one* important question—and I regret that it should be *only* upon one—in relation to this interesting inquiry. I refer to the fact that both Mr. Darwin and myself have been led—each by his own peculiar views—to believe that all organic creation has originated from a single primordial germ.

"In directing attention to this coincidence, I desire that it should be most distinctly understood that nothing could be more remote from my intention, than to attempt in the slightest degree to detract from the originality of that distinguished author's able work. We had both reached the same result through a totally different channel. Mr. Darwin attained by *analogy* to what I had attempted to establish by *induction*; and it is of importance to science that naturalists should be aware that such is the case. For the fact of two independent inquirers, *utterly unconscious of each other's existence*, having reached, by a *totally different order of inquiry*, an *identical* and at the same time an *unlooked for result*—at least on my part altogether unlooked for—such fact, I say, impresses that conclusion with such a stamp of probability as *almost*, in my mind, to withdraw it from the domain of *hypothesis*.

"I shall here merely add, that nothing is advanced in this publication that is not perfectly in harmony with the Mosaic record of creation."

The Philosophy of Insanity. By a late Inmate of the Glasgow Royal Asylum for Lunatics at Gartnavel (Edinburgh: Maclachlan and Stewart, 1860.)—This highly interesting work is written by the author as a grateful acknowledgment of the good which he himself had re-

ceived, from time to time, in a lunatic asylum; and in the hope that the record of his experience would tend to diminish the popular fear entertained of those institutions. "I have endeavoured," he says, "to strip lunatic asylums of all imaginary terrors, and to render them familiar to the mental view; and, by so doing, I hope that I may be instrumental, in some cases, in doing away with the necessity for their use. This has been a natural consequence in corresponding cases, and I know no reason why lunacy and lunatic asylums should form exceptions to the general law." (p. 14.) The singular vigour and interest of the work in many parts, but particularly where the author is recounting some portions of his own history, may be judged of by the following quotations:—

"Tobacco, if long made use of, takes a fearful hold on the mind and body. The sudden deprivation of it is a desperate punishment, and has in many cases produced temporary madness. The magistrate who condemns two offenders for the same offence to the same term of imprisonment—the one a slave to tobacco, the other free from its dominion—condemns them to a very unequal amount of punishment. There are two circumstances to be considered in connexion with this case. One may be termed physical, and the other mental; there is the morbid craving for the accustomed supply of the drug, and there is the habit formed by the furnishing of that supply. Every smoker must have observed that during sickness, when the desire for tobacco, and very likely for everything else, had left him, that the mere force of habit would keep impelling him to fill and light his pipe. It would require hard fighting to conquer either of these habits, but when united they will be found in most cases invincible.

"The late Mr. Leith, coach proprietor in Glasgow, had a groom who could not be contented without a brass pin in his mouth, with which he indulged in the remarkably cheap luxury of jaggling his gums. One day Mr. Leith had occasion to send him to Hamilton, distant about ten miles, when he said to his man, 'Now, Tom, if you will ride to Hamilton and back without the pin in your mouth, I will give you five shillings.' Tom threw the pin from him, mounted his horse, and rode off with a face that had quite a conquer-or-die look about it. To keep himself free from temptation, he also threw away a few spare ones that he had in the breast of his jacket. He returned crest-fallen, and confessed that he had been obliged to dismount on this side of Hamilton, and regale his gums with a thorn from a hedge, as a substitute for the accustomed pin. Habit had conquered; indeed, I believe that habit almost always gains the first, second, and perhaps the third battle; but fight on, and perseverance will annihilate him.

"When a young man, I was at one time employed close upon the sea shore, and having little companionship, I attached myself very closely to my pipe; and the consequence was that I smoked myself into a low, nervous, feverish state, besides getting nearly blind. I felt that I ought to refrain, but the desire and the habit swept the judgment and the will before them as the autumnal wind sweeps before it the rustling, dry, brown forest leaves.

"At a short distance from where I dwelt there was a rock, the base of which was dry at low water, but a depth of six or seven feet was around it at flood. In a cleft of this rock I deposited my pipe at low water, resolving that I would drop smoking if I could, and that, at any rate, I would not take a smoke till I came back and took the pipe from its hiding-place in the rock. This, of course, I meant as a check upon me, and so it was for a few hours. I faced it boldly for about four hours. The consciousness of doing right upheld me, and then habit began to turn my pockets inside out, in search of something

which I vainly strove to make myself believe was not the pipe. Then came the physical craving, the unbearable gnawing, and the two kept dragging me back to the rock, as the dog drags from his box the very unwilling badger. I spent a miserable afternoon and night, got silent and sulky, and very sententious in my mode of expressing myself. For example, my landlady kindly asks, 'Are you no very weel the nicht, my man?' 'Quite,' says I. 'I havena seen you smoking this while,—hae you nae tobacco?' 'Plenty,' replies I. 'Dear me, but you are as short as cat's harns,' says the good old woman, and so ends our conversation.

"I went to bed, but could not sleep. About midnight strange ideas began to flit through my brain. I could stand out no longer. On goes my clothes, with very little ceremony as far as regarded braces and buttons, and off goes I post haste for the rock. The tide was about half run, but a strong and steady breeze from seaward was still dashing the waves far up upon the rock, sparkling with that phosphorescent gleam peculiar to salt water when stirred by whatever cause in darkness. In went I,—the second and third waves which met me, dashed up breast high and filled my mouth with brine; but wave number four found me under the lee of the rock with my pipe in my hand, and before many minutes had elapsed I was smoking away furiously, with my boots full of very cold water, and my clothes hanging about me like wet sails." (p. 32.)

"Lunacy, like rain, falls upon the evil and the good; and although it must for ever remain a fearful misfortune, yet there may be no more sin or shame in it than there is in an ague fit or a fever.

"With a feeling allied to fear we behold a grim array of the insane dead—once famed in science, in arts, in literature, in arms—as it were starting from their graves and passing in review before us. How our hearts cling to Cowper, with his pale, pensive face, and mild, warm heart, that throbbed and glowed with love to all that nature ever bore. And how we shrink as crimson-coloured Clive, with martial step and eye of pride, strides past lacquered with Eastern blood. And slowly rising from her sun-scorched grave, glides past the much-loved L. E. L., spiritual as in the days when she made young hearts to thrill under the witching spell of her melody—her whose genius, in our youthful days, we worshipped unseen:—The heart-stilling liquid is in her hand—her eyes are turned upwards—she prays for forgiveness, and fancies that she hears the far, far distant notes of an angel voice mingling with the deep breathings of her fearful despair. And, 'revisiting the glimpses of the moon,' conscientious and stern, stands Miller, who died nailing the white flag of science to the crimson shoulder of the cross. And thou Tannahill, sweet songster of the west, with thy sensitive nature, which shrunk from the briars and nettles which pricked and stung thy tender feet; what a sympathetic chill creeps round our heart as we look upon thy wet, shivering form, and hear the night wind stirring the drenched bay leaves which encircle thy pale and dripping brow. No man of fire or blood wert thou; and, true to thy nature, thou chose the love-mad maiden's death, who drowns her hopeless grief, closes her sleepless eye, and cools her burning brain beneath the stream. How sad, how sorrowful to think that a mind which has shed light and joy into many a heart and home, should itself disappear amid despair and darkness. And, glancing like a meteor in the gloom, shines Goldsmid's jewelled form: insanity's blast blows hard—his golden anchors are dragging—a crimson winding-sheet flaps in the gale, and an open sepulchre lies under his lee.

"To this dread appeal also answers Irving, Swift, Collins, Castlereagh, Chatterton, Hall, Romilly, Defoe—'What! will the line stretch out to the crack of doom?'" (p. 91.)

Hints on Insanity. By JOHN MILLAR, L.R.C.P. Edin., Medical Superintendent, Bethnall House Asylum, London. (Renshaw.)—These

hints are intended to be "useful to those medical men who have had no opportunity, during their professional education, of becoming practically acquainted with Insanity, and whose time is too much occupied to permit them to make a special study of a disease which they are seldom called upon to treat." The work is well fitted to effect its object, and will be found very serviceable to medical men who are only rarely called upon to certify in cases of lunacy.

On Insufficiency of the Aortic Valves in connexion with Sudden Death; with Notes, Historical and Critical. By JOHN COCKLE, M.D., F.L.S., Physician to the Royal Free Hospital, pp. 30. (Davies.)—This is an exceedingly interesting and thoughtful essay, the nature of which is fully expressed in the title.

De la Colonie de Fitz-James succursale de l'Asile Privé d'Aliénés de Clermont (Oise) considérée au point de vue de son organisation Administrative et Médicale. Par le Dr. GUSTAVE LABITTE, Médecin en Chef de l'Établissement. Paris, 1861. (Baillière.)—Dr. Labitte gives an interesting account, and reports most favourably, after a four years' trial, of the success of this colony. From this experience he deduces the following general principles of asylum construction and management:—

"A Lunatic Asylum ought to suffice in itself, that is to say, it ought to have in its patients, by a wise application of such services as they can give, all the means of diminishing expenditure. For this purpose a very large asylum population is necessary, because in a great number of patients it is easy to find workers suited to all the wants of the establishment. The importance of this population permits also the formation of a farm, an indispensable creation not only for the treatment of the patients but also for profitable management. The farm ought to be organized upon a sufficiently large scale, because all cultivation of this kind is less expensive the more extended it becomes. A Lunatic Asylum ought then to enclose at least a thousand patients of both sexes. From this population it will be easy to select, apart from the patients employed in the workshops of the establishment, two hundred lunatics to work upon the farm. This number is sufficient for the cultivation of two hundred hectares of arable land, an amount indispensable to the wants and alimentation of such an asylum. This population, moreover, permits more frequent changes between the asylum and the farm—changes always favourable to the patients and often necessary for the order and discipline of this last establishment. The asylum and the colony ought to be dependent upon one administration alone, of which the centre should be at the asylum. Lastly, in order that the services should suffer no obstacle in their execution, there should be but one head, and that head should be the physician." (p. 23.)

The interesting and useful *Account of Sir Charles Bell's Discoveries in the Nervous System*, by Mr. ALEXANDER SHAW, Surgeon to the Middlesex Hospital (Murray), and appended to the sixth edition of the Bridgewater Treatise on the "Hand," has been published by the author in a separate form. We have also to notice the publication of a third edition of Mr. Charles Bray's suggestive work on the *Education of the Feelings or Affections* (Longman); and a second edition of Dr. Guy's *Principles of Forensic Medicine* (Renshaw). This excellent work we shall recur to in a subsequent number, but in the meantime we may state that, although some portions of it have been abbreviated

and others omitted, yet several new subjects have been added, also many woodcuts—a novel feature in English works on Medical Jurisprudence. Written originally for students, and this object being kept in view in the present edition, the utility and value of the work as a class-book are greatly enhanced by its altered form.

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In Memoriam.

(WILLIAM BALY.)

IN offering a few observations in reference to one who has so recently been amongst us, were we for a moment to permit personal feelings to influence the discharge of public duties, we should rest satisfied with recounting to the profession instances of the gentle nature, kind disposition, and great personal worth of him whose lamentable death we, in common with all who had the privilege of his acquaintance, mourn. To those who knew Dr. Baly, his characteristics are familiar. To those who may be led to inquire by what means one who, having entered the medical profession without the external advantages generally regarded as essential to success, attained to its highest position, and at an early age was followed to his grave by the great and gifted of the land, an impartial scrutiny of his life may not be without advantage. We have already* impressed on our readers, as a great fact, that success is the result of merit, and endeavoured to point out to those entering upon medical studies the necessity for a patient, painstaking spirit of inquiry, and steady earnestness in the pursuit of their profession. To the sceptical in reference to the sufficiency of intellectual and moral excellence for the attainment of the highest success, we again detail a career singularly illustrative of opinions anxiously enunciated as truths—right in principle and proved in practice.

WILLIAM BALY was born at Lynn, in Norfolk, in 1814. In his early career there is little special interest. In common with the majority of English youth of the middle class, he received a sound preliminary education in the Grammar School of his native town. His father, while engaged in the active pursuit of provincial commerce, found time and opportunity for the cultivation of general literature, the fascinations and advantages of which he early impressed on his son. His mother, who united to a highly cultivated mind good sense and refined judgment, insensibly exercised that guiding influence to which, more than to all other causes combined, is attributable the success of the greatest men. Both parents contributed to their son's future proud position; from the one he inherited an active persevering honesty of character which, when

* See last number—Memoriam (Dr. Todd).

associated with genius, ever offers an irresistible combination; from the other he derived a due appreciation of those higher studies and duties which subsequently guided and controlled his ambition. Impressed with the practical reality of life, the character of his home education influenced his conduct throughout the future, and imparted to his actions an apparent timidity which, to those who knew him, was nothing more than the struggle of prudence with ambition. At an early age young Baly expressed a wish to enter the medical profession; which, to a mind so constituted, must ever offer special attractions. He was accordingly apprenticed to Mr. Ingle (now Dr. Ingle), of Emsworth, a general practitioner of high professional and personal repute. From this gentleman he derived that rudimentary knowledge which subsequently bore such splendid fruit. The apprentice soon mastered the details of duty presented by country general practice. An experimental and practical acquaintance with pharmacy as a means to an end, a capability of recognising disease in its familiar forms, a certain degree of intimacy with the general run of surgical cases, acquired under the kindly guidance of Dr. Ingle, prepared his mind for entering on that large field of observation and practice to which too many students are annually introduced without previous questioning of their fitness or capacity. In 1831 Mr. Baly entered University College as a pupil. Diligent in his attendance on lectures, constantly present in the anatomical school, he laid a sure and sound foundation for future practical success by acquiring a thorough acquaintance with the Organism, and a complete theoretical knowledge of the laws which experimental philosophy demonstrates as influencing the operations of life. In the following year he entered at St. Bartholomew's Hospital. Here, to a mind prepared for observation, what to many were inexplicable difficulties, proved great opportunities. In the practical observation of disease he attained the consummation of his studies; in its diagnosis he tested the fidelity of his impressions; in its treatment he proved the truth of his inferences. Earnest and energetic in his pursuit of the bedside investigation of disease, he soon attracted the notice and gained the approbation of the clinical physicians, Drs. Latham and Burrows. To the former much of his subsequent success is due. From both he then and throughout life experienced many proofs of confidence and esteem. So impressed was each of these gifted and highly distinguished men with the capacity and character of their clinical pupil that they severally counselled him to settle in the metropolis, and to venture on the life of a London physician. Their advice determined his career. In 1834, having passed the College of Surgeons and the Apothecaries' Hall, he repaired to Paris, where he devoted the following winter to profes-

sional studies. In the spring of the ensuing year he proceeded to Heidelberg, and thence to Berlin, where, in 1836, he graduated as Doctor of Medicine. How fully Dr. Baly availed himself of the advantages of the several continental schools may be inferred from his intimacy with the opinions, writings, and practice of their most distinguished professors, with many of whom he had even then the privilege of friendly personal communication.

On his return to England, Dr. Baly commenced practice. By this the reader must understand that, virtually unknown in London, without other introductions than those which his professional exertions had gained, without friends except those which his own high personal character had secured: and with limited pecuniary means, he fixed his residence in Vigo-street, and by placing his name on its door, informed the public that a stranger anxious for their support had come among them. The first years of professional life are trying to every man. To the youth, enterprising and ambitious, who stands alone in the vast arena of metropolitan competition, each day is fruitful in stern lessons of perseverance and self-denial. Before him is the proof of success; around him are difficulties which appear to be insurmountable; pressing necessities of the present must be provided for, while great expectations for the future are not relinquished. It requires a stout heart, high hope, self-reliant energy, and a well-disciplined mind to divest disappointment of its bitterness, and to bear up against the sickness of heart which results from hope deferred. Success is certain sooner or later to those so endowed. Small intelligences growing faint and weary on the way, and unequal to the strife, rest satisfied with respectable mediocrity. They are not, therefore, the less happy in their career. Success beyond their attainment is seldom within their capacity. Men of ability and energy ever triumph. They do surmount opposition. They create, if they cannot command circumstances, and prove equal to the opportunity. Dr. Baly was an example of this truth. Within a year after his return to England he was actively employed as medical officer to St. Pancras Infirmary, to which post he was elected solely on account of the high character he had established during his pupilage, and the deserved reputation he had acquired while abroad as a student. At the same time he was induced to undertake the translation of Müller's *Physiology*, a work which will always live as a monument of its author's great genius and of Dr. Baly's untiring industry. The opinion entertained by the profession of the manner in which this important trust was discharged need not be recapitulated. While the text of the book proved Dr. Baly to be an accomplished scholar, its notes evinced him to be a painstaking experimentalist and an expert and original investigator. This arduous and responsible

work was undertaken not from any special predilection for the science of which it treated, but rather as a means to an end—a present source of income, consistent with a course of study, indirectly though not immediately available for the practical purposes of his profession. On the appearance of this work Dr. Baly took deserved rank amongst men of science. His teachers and friends felt that their opinions were well founded, and their expectations just. In his new position Dr. Baly evinced the same steadfastness of purpose, sobriety of thought, and forcible simplicity of judgment, which having secured for the student friendship, won for the practitioner respect. It will be seen that the impressions then made, and subsequently fully realized, were not without their practical results. The youth of the profession should lay these facts to heart. They are the true lessons of success in life.

In 1840, epidemical disease prevailed in London. In Millbank Penitentiary, more especially, dysentery was very prevalent. On Dr. Latham's recommendation Dr. Baly was directed to visit and report on its sanitary condition. The manner in which he discharged this duty was eminently satisfactory to those who had appointed him. A vacancy occurred in the following year, and Dr. Baly was at once elected as physician to that establishment, which position he continued to hold until his death. To a young man of Dr. Baly's ability and circumstances such an appointment was invaluable. Anxieties in reference to pecuniary matters were at an end, while ample opportunity for the observation of disease was afforded. How fully he availed himself of the latter, and how amply he repaid the confidence of his teachers, the medical profession well know. They, however, are not alone in the benefits which resulted from this appointment. To Dr. Baly is due that revolution in the hygienic management of prisons which late years have witnessed. In constant communication with successive Home-secretaries, Inspectors, and Governors, he impressed on the authorities the truth now generally acknowledged, that the physical and moral condition of man are inseparably united. Prisons have ceased to be pest houses. Punishment now acts on the mind equally with, or we might add, rather than on the body; and, while the law is vindicated, humanity is no longer outraged. Dr. Baly's elaborate paper on "Diseases of Prisons," in the twenty-eighth volume of the *Medico-Chirurgical Transactions*, his Gulstonian Lectures on Dysentery, published in 1847, manifest a minute and accurate observation of their several subjects sufficient to explain the confidence which those in authority reposed on his experience and judgment.

In 1841 Dr. Baly was appointed Lecturer on Forensic Medicine at St. Bartholomew's Hospital. This lectureship he held for

fourteen years, discharging its duties with credit to himself and advantage to his classes; nor did he resign it, until he was called to the higher and more responsible office of assistant-physician to the same great institution, and in conjunction with Dr. Burrows, his former teacher, to the lectureship on Medicine in its distinguished school. To the former of these positions he was elected in 1854, to the latter in 1855. In the interval between his appointment to Millbank and to the physicianship of St. Bartholomew's, Dr. Baly had grown in favour with the profession and the public. At the desire of the College of Physicians (of which body, in 1846, Dr. Baly had been admitted a fellow), he undertook to report on cholera. To those who have read and studied his volume a recommendation is needless. To those who have not done so, we unhesitatingly declare, that if Dr. Baly's reputation had rested on it alone, he had written enough to render himself eminent.

In 1847 he was elected a fellow of the Royal Society, a distinction reserved for men who can found special claims on original research in science.

From Dr. Baly's appointment to St. Bartholomew's Hospital may be dated his prominence amongst his professional brethren. He was soon most highly esteemed by his colleagues, and very popular with the students. His teaching was highly practical, he was readily accessible to every one seeking information, and always anxious to impart knowledge. The patient gave confidence to ability which each day practically demonstrated; the pupil respected opinions never hastily formed, and generally verified. The principle of his life stood declared at each step of his progress, it was this—always to enter on a duty with firm resolve to approximate to its perfection, if he could not wholly achieve it. That which he undertook to do, he did well. Without the startling attributes of genius by which men have risen from the ranks of every-day life to exalted positions, he possessed those qualities which, in practical life, must ever achieve a certain success—clear intelligence, ambition regulated by principle, and a heart whose affections and impulses were influenced by religion. His was not the nature to force its way into pre-eminence, but having been placed in the highest position, the duties and responsibilities which it entailed entered into the routine of his daily practice as part of his habitual vocation. Such a disposition required but opportunity to ensure success in a profession where the heart and head co-operate for a common purpose—the relief of suffering humanity.

The deserved reputation Dr. Baly had acquired in the opinion of the authorities with whom, from his official position, he was brought into relation, caused him to be consulted by the Crown

on most of the grave jurisprudential questions which have arisen of late years. We know that to his report is mainly, if not entirely due, the remission of sentence in a remarkable case which a year or two since engaged the public mind. His official character stood as much above reproach as his professional capability above question. It is not surprising that when opportunity offered to those who had proved his capacity and known his excellence, to select one for the highest position open to a physician, their choice should have proved a corroboration of the confidence which Dr. Baly had fairly earned, and justly enjoyed. In 1859 it became requisite to select a physician who might at first share with Sir James Clark, and then hold alone, the office of regular attendant on the Queen and Royal Family. To this distinguished duty Dr. Baly was called. The unanimous voice of the profession approved the wisdom of the selection.

During the short time Dr. Baly held this high office, he received many proofs of confidence from the Queen and Prince Consort; not the least of which was his nomination to a seat in the Medical Council as one of the representatives of the Crown, in the place of Sir James Clark. In the meridian of life, and the full vigour of intellect, he seemed destined to a long and prosperous career; but Providence ordered it otherwise. All are familiar with the lamentable accident which resulted in his death; but all do not know that though the cause was unforeseen, the victim was not unprepared. Men who live as Dr. Baly lived need not fear to die. His mind was schooled in the truths of religion, which regulated his thoughts and governed his life.

The immediate circumstances of Dr. Baly's demise cannot too deeply or too long rest in the minds of those whose daily occupations show that death and destruction are around each path, while danger floats in the very air they breathe. On Monday afternoon, the 28th of January, Dr. Baly attended as usual his hospital duties. In health and spirits he conversed with his class. He mentioned that he had received a telegram summoning him to Guildford. He drove to the Waterloo station, and in his haste left both card-case and note-book in his carriage. He proceeded by the train which leaves London at ten minutes past five. Some short distance beyond the Wimbledon station the tender and five of the carriages of the train were jerked off the rails, and rolled down an adjoining bank. The carriage in which Dr. Baly was sitting, by the force of its oscillation, jerked him through its opening. He fell on the line of rail. The carriage immediately following turned over upon him, and crushed him to the earth. It is a sad consolation to know that from the nature of the injuries death must have been instantaneous. His temple was beaten in, his side pressed against his spine, his mouth was filled with sand,

and his features were so disfigured, that when drawn from beneath the carriage his mangled remains were incapable of identification. His body was removed to a small inn at Malden, where it remained unrecognised. As he did not return during the night, his sister, on the following morning, sent word to the hospital that he had been detained in the country, and could not deliver his usual lecture. The gentleman who had sent for him, hearing of the accident, and alarmed at his non-arrival, went to town. On the following morning a stranger called at the hospital, and requested to see the medical officers. The calamity was then made clear. It is unnecessary to detail the long and searching investigation which the duty and affection of his executor and friends caused to be instituted on the coroner's inquest; it is sufficient to add that the occasion of the accident was so involved in scientific subtlety, that the inquiry terminated in the usual anomalous decision characteristic of such tribunals. The fact of Dr. Baly's death remains, while the origin of the accident is undetermined. On this fact it is our sad office to comment. His life afforded a cheering and encouraging example, his death has added a solemn and impressive moral. It speaks of the uncertainty of life, the vanity of human joys, and the equality of the grave, in language that cannot be misunderstood.

In our last number we offered to our medical youth the encouraging assurance that merit and perseverance seldom fail to create friends, and conquer difficulties. We then traced the career of Dr. Todd. Alas! that so soon we should be called upon again to record labours crowned with equal success, and a career prematurely and sadly terminated. Yet so it is. If men were empowered to regulate their own future, who is bold enough to affirm that he could improve his condition? The mysterious providence of God controls the movements of each; and is not the less merciful, because we grieve at its manifestation, and not the less loving, because its operation is beyond our finite comprehension.

FOREIGN MEDICO-PSYCHOLOGICAL LITERATURE.

OUR Retrospect of current Foreign Medico-Psychological Literature will embrace the following subjects :

1. On the Confounding of Persons as a Symptom of Insanity.
2. On the Employment of Opium in the Treatment of the Insane.
3. On Fever in its Relations with Mental Alienation.
4. On the Special Forms of Delirium which supervene in General Paralysis.
5. Statistics of Suicide at Turin during the Years 1855-59.
6. On the Legal Responsibility of the Insane.
7. On Delirium as a Precursory Sign of General Paralysis.

I.—*On the Confounding of Persons as a Symptom of Insanity.* By
Dr. SNELL.

THIS subject has not, in relation to its frequency and importance, received, in the opinion of Dr. Snell (Director of the Asylum at Hildesheim), so much attention as it deserves. This disposition of the insane to mistake persons who have first become known to them during their malady for others whom they had known before this commenced, depends, seemingly, upon a deep-seated psychological law, and may often be turned to good account in establishing diagnosis. It has occupied the author's attention for several years past. After relating twelve cases of insanity in illustration, he observes that it is most frequently met with in mania (its absence here indeed being exceptional), and next in dementia following mania, and accompanied by excitement. It is also not rare in recent melancholia, and in all forms of melancholia accompanied by excitement. It is seldom met with in the various forms of monomania and in apathetic dementia. The author has found it prevail in more than half of the cases on admission into his asylum, and in only a third of those who have resided for some time within the establishment. It may be stated that the confounding of persons is the more observable in proportion as the delirium is more general. It is, however, by no means a symptom bearing an unfavourable prognosis. It is of frequent occurrence in the delirious fever of acute diseases, as pneumonia and typhus. The diminution of the confounding of persons is a good sign of recovery in mental diseases. It is not an isolated deception on the part of the patient, for there is often the same confusion with respect to objects, places, &c., as to persons; and the frequent passion which maniacs have for collecting stones and other worthless objects may be in part explained by their confounding these with objects formerly known to them. In explaining the occurrence of these various self-deceptions, we must bear in mind the hallucinations of the senses, which play so important a part among the insane, as well

as the illusions as to the resemblance which the confounded persons bear to each other—a slight degree of which may exist in some cases. Independently, however, of hallucinations and illusions, the remarkable disposition which the insane have to confound objects seems to have a fundamental relation to a general psychological law. Every observer must have remarked the incapability of the insane to do other than move within the accustomed circle of thought. The patient transports his former perceptions direct to new objects, and confounds the one with the other, being far too much occupied with himself to adapt new ideas derived from the outer world to his old ideas. It is for this reason that so many patients cannot keep pace with time, but, as regards it, remain stationary at the point when the development of their malady commenced: so many also believing that they shall never die, or that they had lived from the beginning of the world. They are unable to comprehend their changed conditions, either as regards the past or the future. Something very like this is also observed in children, who are easily deceived as regards persons and things, and mistake the unknown and the new for the known and the old.

The author terminates his paper with the following conclusions:—
 1. The confounding of persons, places, and objects is one of the most frequent symptoms of insanity. 2. It is one of the most certain and most easily detected symptoms of psychical disturbance. 3. It is proportionate to the degree and general character of the mental excitement, and it is in general a favourable prognostic sign. 4. It is most frequently observed in cases of recent occurrence. 5. In the passage of the primary forms of psychoses into the so-called secondary forms, the confounding of persons not unfrequently disappears; and its doing so is here an unfavourable sign. 6. In the passage of the primary forms of mental disturbance into recovery, such disappearance is one of the most certain tests of recovery.—*Allgemeine Zeitschrift für Psychiatrie*, Band xvii. ss. 545, 554.

2.—*On the Employment of Opium in the Treatment of the Insane.*
 By Dr. L. MEYER.

NOTWITHSTANDING the numerous researches and observations which have been made on the influence of opium in insanity, the conditions have not yet been precisely laid down under which it may act beneficially or mischievously. Under these circumstances, Dr. Meyer has sought to obtain the rule for the employment of opium in disease from the vast dietetic use of this substance made by so many persons in various countries. He regards this dietetic employment of the drug as an experiment on a vast scale, the conclusions from which are the more applicable to psychiatry, inasmuch as the appearances arising from the morbid conditions of exhaustion, on account of which the opium is resorted to, exhibit considerable analogy to the symptoms of certain forms of insanity.

The author relates twelve cases in which he has watched the admin-

istration of opium; and, according to his experience, it is of especial use in those reflected forms of insanity which may be finally referred to a neurosis of the sexual apparatus—*hysterical alienation*—which in its acutest and most aggravated form exhibits itself as ecstasy, always associated with religious or erotic mania, and most often with both. The loss of strength from deficiency or absence of sleep is of the more importance in these cases, inasmuch as it is not compensated by taking an increased amount of nourishment. Under the influence of opium the paroxysms cease. The indication for its use thus oftenest occurs in the female sex; but a complete condition of hysterism may be also induced in man by masturbation and other debilitating influences. Opium is also of utility after the debilitating conditions of the puerperal state, and after uterine hæmorrhage—the mental disturbance, and the hæmorrhage, however, being only regarded as co-ordinate symptoms of the same condition of disease—*hysteria*. It is of service in other conditions of debility, although its influence is not exerted directly against the cause of such debility, for after the relief of the psychical disturbance, the conditions of anæmia and weakness may persist. For a rapid recovery a short duration of the disease is a necessary preliminary; and an exact diagnosis is essential. As contra-indications especial attention must be paid to the signs of acute idiopathic cerebral irritation, and to the inflammatory character of the disease as shown by fever, ascertained to exist by measuring the temperature. Dr. Meyer commences with a dose of two grains, repeating it in two hours. If repose and sleep are obtained, it is discontinued; and at all events after four such doses there must be a pause of from six to twelve hours, when the opium must be repeated as before, if still required. Sometimes the opium seems to be only absorbed to a slight extent, and obstinate diarrhoea is rather to be feared than constipation. In very urgent cases the first dose may be raised to three or four grains, while in great gastric sensibility and inclination to vomit it may be diminished to one grain and repeated hourly. Opium enemata are not recommended, but the injection of a solution of morphia into the cellular tissue is a useful procedure, on account of its easy applicability and its rapid and certain effect. In the more chronic cases of hysterical alienation more moderate doses are to be used, as from one to three grains one hour before bedtime. Opium is also of use in the hysterical alienation which results from alcoholismus and chronic metallic poisoning. Dr. Meyer warns his readers against the error of regarding opium as a universal remedy in melancholia or melancholia agitans; and even in cases in which its use is indicated, it must be discontinued when anorexia and a loaded tongue, with obstinate constipation, have continued for two or three days.—*Schmidt's Jahrbucher*, Band cix. s. 81.

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- 3.—*On Fever in its Relations with Mental Alienations.* By Dr. S. BERTHIER, Principal Physician to the Lunatic Asylums of Bourg (Aix).

UPON an examination of the influence of fever in the causation and

modification of insanity, Dr. Berthier has arrived at the following conclusions:—

I. Fever, continuous, remittent, or intermittent, under certain circumstances may be accompanied or followed by delirium.

The delirium superadded to fever sometimes is but an epiphenomenon which is dissipated with it, sometimes a concomitant, which yields to appropriate treatment, sometimes the fatal result of an organic lesion.

When the delirium is concomitant, it very generally exhibits either the periodical or the ataxical element which gives way to quinine.

When it is the result of an organic lesion, it indicates a “*mouvement de concentration*” of the fluids, inflammatory congestion of the brain, or the presence of inflammation, which bleedings and the various derivatives are often unable to overcome.

But when *chronic delirium* follows these kinds of fevers, it constitutes madness; it is no longer an accident or a coincidence, nor even a complication—it is a new malady which substitutes itself for the old one with a gravity of a totally different order. Then, as after certain forms of typhus, we find ourselves in face of a passive congestion of the nervous centres, or a universal impoverishment of the system, or, as at the end of long intermittent fevers, of general impoverishment of the economy; two conditions equally unfortunate, which announce a battered organization, and especially call for analectical treatment.

It becomes necessary to suppose in this case a disturbance of equilibrium between the vital forces and the powers of the soul, a disturbance which lies in an instrumental defect, and places the soul under the impossibility of manifesting itself in full liberty.

Madness following upon intermittent fever, perfectly described before our day by Sydenham, Hoffman, Home, Morgagni, Sauvages, and in our own time by Sébastian, Focke, and Baillarger, is generally expressed under the form of melancholy, and in the case of persons predisposed, either originally or hereditarily, it passes easily into a chronic state which is rarely cured.

Paludal intermittent fever, far from furnishing a superior contingent to that of fevers the accesses of which are of a contrary nature, appears to limit its action to the vegetable life, and to subject to its ravages the ganglionic and rachidian nerves. Let us add: the relations between intermittence and madness deserve to be closely examined.

Intermittence has great analogy to nervous affections. Lorry placed its seat in the nervous system: “*Hanc causam periodorum in nervis quærendam esse ad eos solos referendam.*” Bordeu was of the same opinion.

Neuralgic affections have a more or less marked affinity with paroxysmal fevers. They have a singular tendency to assume the intermittent type.

The generality of the pathological phenomena are accomplished like the latter, in six, eight, ten, or eighteen hours. They terminate often in the same kind of crisis. Besides, when much intermittent fever exists, the neuralgic affections associate themselves completely with the periodic nature of those fevers.

Finally, in countries where the periodic element plays an important pathological part the maladies called nervous are exceedingly common, as seen in Brescia.

II. The morbid element, fever, alone or associated with other causes, may, as regards mental alienation, either cause it, modify it, or complicate it.

As an etiological condition it takes its gravity from the form which it affects and the character it assumes; continuity is the most important feature, especially if allied with the ataxic state, the intermittent form other than paludal appears to attack more particularly the cerebral system, the paludal form the ganglionic system and the rachidian marrow.

As a therapeutical condition, it sometimes impedes the progress of madness, it more frequently suspends it.

As a pathological condition, it submits to the diathetic empire with which madness impregnates the organism, it assumes insidious aspects which deceive the unaccustomed eye, and it demands in its treatment the analytical method which best places in relief the rôle of that empire.

4.—*On the Special Forms of Delirium which supervene in General Paralysis.* By Dr. LEGRAND DU SAULLE.

IN a note upon the special forms of delirium which supervene in the course of general paralysis, read before the Academy of Sciences, by Dr. Legrand du Saulle, he speaks first of the grandiose delirium, noted by Bayle, as being the precursory sign and symptom of general paralysis. He says that, placing himself in conditions similar to those in which Bayle had placed himself, and noting only cases of monomania and mania, ambitious delirium can be demonstrated in four-fifths of the cases of mania which terminate in general paralysis. Invoking the authority of M. Calmeil, M. Legrand du Saulle establishes the diagnostic and prognostic value of this form of insanity.

Passing to hypochondriacal delirium, he reminds us that this form of delirium had been noted in 1857, by M. Baillarger, in melancholic paralytics; and that this able *clinicien*, without considering this delirium to be either constant or exclusive, believed that it was met with in four-fifths of the cases of melancholic paralytics.

Then, examining the conclusions of a recent work by M. Linas, Dr. Legrand du Saulle arrives at the following results:—

1. If grandiose delirium is objected to, it is because the objectors have either confounded observations of a very different character, or they have considered only one period of the malady (general paralysis).

2. No one pretends that this delirium is constant and exclusive, but, from its extreme frequency among paralytics and its rarity in simple maniacs, it constitutes a very important symptom.

3. Hypochondriacal delirium is as frequent among melancholic paralytics as it is rare among patients attacked with simple melancholy. Hence it is, as grandiose delirium, a very valuable diagnostic and prognostic sign.

4. Observations anterior to 1857 (and all those which have been advanced in opposition are in this case) cannot in any way invalidate the preceding proposition. Hypochondriacal delirium in general paralysis is a symptom which, like many other symptoms, requires to be sought for, in the great majority of cases, before it can be discovered. — *Archives Générales*, Dec. 1860.

5.—*Statistics of Suicide at Turin during the years 1855-59.* By M. FIDÈLE TORCHIO.

THE following are some of the data furnished by this work:—During the eleven years 1825-35, there were 73 suicides at Turin, that is to say, in the proportion of 6 to 16,000 inhabitants, or an annual average of 6; during the five years 1855-59, 108, or 6 to 9000 inhabitants, or 21 per annum. Of these 108, however, 29 were persons passing through the town; 94 were males and 14 females. Of the first, one-half (48) were between 21 and 35 years of age, whilst amongst the females the like proportion (8) belongs to the ages of 14 to 25 years. The indication of professions loses much interest for want of some point of comparison. The three states giving the largest number of cases are 23 military, 11 commercial, and 11 employés. As to civil condition, the influence of celibacy shows itself strongly, since, out of 101 suicides, 75 were celibats, 20 married, and 6 widowed. The means of destruction employed were, in 36 instances (all men), firearms; in 9 (also men) sharp instruments; 26 persons (4 women), precipitated themselves; 15 (5 women) drowned; 4 hanged (men); 12 asphyxiated with carbonic acid gas (1 woman); 1 man poisoned himself with hydrocyanic acid; 3 with sulphuric acid (2 women); 1 woman with phosphorus and 1 woman with morphine; that is to say, the women especially had recourse to means which denote a prompt resolution, and the men to those which demand long meditation and preparation. Comparing these documents with those for the years 1825-35, we find, during the latter, drowning claims the most victims, firearms come next, and then precipitation from lofty eminences. Asphyxiation by carbonic acid is not represented. In reference to the influence of the months, these may be apportioned as follows:—July, August, May, and June give the maximum (54 cases); March, September, February, and April come next (34); January, December, October, and November give the least (20).—*Annales Médico-Psychologiques*, Janvier, 1861.

6.—*On the Legal Responsibility of the Insane.* By DR. BELLOC.

1st. There are lunatics whose intellectual faculties are so perverted and obliterated that one could not in any case make them responsible to any one for their actions.

2nd. There are others, probably more numerous than the first, whose intelligence remaining intact with respect to a greater or less number of points, permits them to appreciate the morality of their actions and

authorizes society to call them to account without injustice. But as no one can know where to place with certainty the point where their reason stops, and consequently where their responsibility commences; as the unity of the human will supposes the *solidarité* of all the intellectual faculties between themselves; as an alteration of one of them entails, to a certain degree, not the annihilation but the enfeeblement of others, justice requires that this enfeeblement should be always considered as an essentially extenuating circumstance, and that the idea should never be entertained in any case of applying the extreme penalties provided by the law to a lunatic found guilty.

3rd. The problem which consists in marking out in each particular case the confines of reason and madness, in distinguishing the injured faculties from those which remain intact, in measuring the degree of resistance which the lunatic might bring to bear on the criminal impulse, and to determine equitably the punishment which is justly applicable to him; this problem is so arduous, the data in the present state of science are so vague and uncertain, that every man occupied solely with the interests of justice and morality can but approach it with trembling, and must receive with gratitude any light that may help to guide him, from whatever quarter it may come. The public minister, therefore, and the physician ought not henceforth to consider themselves as in some sort adversaries, charged systematically to sustain, the one the culpability, the other the innocence of the accused, but as colleagues, who have received from society the mission to unite their efforts, in order to arrive at least at an approximate knowledge of the truth.

4th. This research implies on the part of magistrates a serious study of the alterations which the reason of man may undergo. I say, studies not merely theoretical but clinical, and sufficiently prolonged, in order that they may learn to recognise by the language, actions, gestures, and a thousand details of which at present they have no idea, the presence of mental alienation and the degree of perversion of the intellectual faculties in each particular case.

5th. In the contestable cases, and I would only admit as contestable such as are really doubtful, it is reasonable, and consequently just, to attribute a preponderating influence to the opinion of the physician, and to consider legally insane every accused whom he shall declare upon oath to be the subject of mental alienation.

6th. The adoption of this reform in jurisprudence, and, if need be, in the law, requires as a consequence the institution of a central house of correction destined exclusively for criminal lunatics. For a great many years all medical alienists have agreed in calling for the foundation of an establishment of this nature, but they have only spoken of it as an ordinary asylum offering greater security than others for public safety; this is but the half of what I demand from the point of view which I take. To the *asylum of treatment* there ought to be joined, according to my opinion, a *quarter of correction*, in the vigorous acceptance of the term, where the insane after their cure should be detained for such time as shall have been fixed by sentence; and thus would be conciliated at once the interests of justice, those of society, those of the sufferers, and

finally those of their families, upon whom such detention would entail no dishonourable prejudices.—*Annales Médico-Psychologiques*, Janvier, 1861.

7. *On Delirium as a Precursory Sign of General Paralysis.* By
M. LINAS.

M. BAILLARGER has sought to establish the speciality of *hypochondriacal melancholy* as a precursory sign of paralytic dementia; M. Brierre de Boismont has stated that a certain *perversion of the moral and affective faculties* is characteristic of this period; lastly, M. Billod has concluded that *melancholy with stupor* most frequently precedes and announces the paralysis. M. Linas does not believe that the truth rests exclusively in any of these assertions, but that it is found in their union. In other words, depressive delirium, a precursor of general paralysis, has not a special pathognomonic physiognomy. It may have not only a hypochondriacal form, but also other forms characterized by melancholy.

M. Linas, supporting his opinions by clinical observations and the authority of MM. Calmeil, Bayle, Parchappe, Trélat, &c., arrives at the following conclusions:—

1. Neither hypochondriacal delirium, nor melancholy with stupor, has any special character, any pathognomonic value, relative to the premonitory period of general paralysis.

2. At the beginning, as well as in the course of this affection, every variety of melancholic delirium is observed.

3. This truth is not a new acquisition to the history of general paralysis, and the facts related by MM. Baillarger, Brierre de Boismont, and Billod, serve only to furnish a superfluity of demonstration.—*Archives Générales*, Dec. 1860.

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ART. I.—THE VACATION.

THE season for holiday-making is fast approaching. The polite and the political world, the professional and the mercantile, are already beginning to reckon the weeks or days before they can start once more by steamboat or by rail, and leave us poor scribblers far, far behind them, to the summer dust and solitude of London.*

The joy of travelling is universal. To many it is new life, for at heart we are all of us children, or we ought to be so—"pleased with a feather, tickled with a straw." When the morning is bright and clear, and the day for starting has arrived, how cheerfully do we bid a short farewell to home, and hasten on board the steamer, the bustle and confusion of which only give additional zest to the momentary sense of pleasure. The breeze blows afresh as the boat quits the harbour, heaves upon the coming waves, and cuts through the crested foam; health enters by the eye; the optic nerve is engaged with new sights; the invalid forgets himself, and time flies without his knowing it.

To the jaded Londoner, whose nerves are jarred by the incessant railroad, change of air and scene is almost indispensable.

* "I reluctantly left Paris, and hastily drove through the summer dust and solitude of London."—*Gibbon's Autobiography*. What he regretted in 1765 we heartily respond to in 1861. But if Gibbon was delighted with the capital of France a hundred years ago, what would he say to it now? For though the Paris of his day no longer exists, yet most of its social attractions still remain, and the modern city has risen, like the phoenix, young, bright, and new, from the ashes of revolution, bloodshed, disaster, and dynastic change.

At least once a year every one who possibly can, leaves the great metropolis. Fifty years ago, only the privileged sons of fortune could venture on travelling; now, every one travels. Fifty years ago, those strange mental and bodily ailments usually ascribed to medullary softening or exhaustion, were only exceptional cases; but now, almost every case partakes somewhat of their character: the wan eye, the languid gait, the prone and bloodless hand, emphatically bespeak their origin. Odd feelings of numbness, without loss of motor power, an undefined foreboding of impending evil, puny remorse or capricious regrets, irresolution, and disgust of life, indicate either some deep-seated mischief of the nervous centre, or the effects of a moral shock, that has penetrated to the very seat and citadel of life. Intensity is the order of the day; velocity is the soul of business; decision is a matter of necessity; and yet, in fact, the world is only what it ever was. No one can comprehend at a single glance the precise bearing of circumstances and events which speed away from sight as quickly as they had come into view; they are come and gone while one is looking on. It is too late to decide except upon the spot. Decide we must, whether the decision be right or wrong; and much must be left to time, and chance, and the chapter of accidents. Earnest but feeble minds find the task too much for them, and they shrink unconsciously from the weight of a responsibility which is forced upon them without the delay proper for deliberation. Their nerves are overstretched, and they totter or fall.

The master minds are so few, that we may consider them as the giants looked up to and implicitly followed by the crowd. The rest of mankind are nothing more than ordinary mortals. Nevertheless, we are all of us hurried away, both giants and dwarfs, by a gigantic order of affairs, to which there is nothing analogous in the course of history. In spite of ourselves, we are all *fast* men. Every one suffers from it. Health is no longer what it was. Nervous maladies take the lead, fevers are of a low type. Formerly the latter were acute and inflammatory, now they are just the reverse. The treatment that was successful then, would it be successful now? Would not the present plan of sustaining the failing powers of life have in those days only added fuel to fire? The whole is changed—the mode of living, the features of disease, and the style of practice; all is changed, and so are we ourselves. Everything tends to promote a direct pressure on the nervous system, to raise a call for incessant excitement. There is no interval of rest. The great town roars from morning till night, and from night till morning. A short hour or so before dawn, its granite pavement may be silent; but at sunrise, or before sunrise in winter, the hum begins again, goes on increasing, and

shortly rises into one long continued roar. To sleep, is it possible? The intellect, does it ever sleep? Dreams, are they not the waking thoughts, hopes, fears, and ambition or despair of the day? And what is the consequence? This patient has lost the use of his arm, another is blind or paraplegic, a third is losing his memory and self-possession, and is obliged to resign a lucrative post. They all look ill, and, in fact, are very ill. They all show signs of wasted blood and damaged nutrition of the brain. They are all of them temperate. They none of them smoke, or drink, or do worse. On the contrary, they are upright to a nicety, only the burden of life is too much for them.

The weariness of life, incidental to mental and bodily exhaustion, is a form of disease of peculiar inveteracy. Sometimes it amounts to unmitigated apathy, pervading every function of the frame. To cease to be, is the only desire left, connected with a vague and indefinite idea of leaving life for the purpose of shaking off an incubus weighing heavily on the mind. The nerves are unstrung and no longer respond to the touch of interest or affection. Perhaps, it may be said, that overwrought luxury or care is but a protracted suicide, long-drawn out. Which is the better or the worse, the profligate who destroys himself piecemeal, or the greedy usurer who supplies his needs? What is the value of a great reputation at the bar or in medicine, if you are found dead in your bed, with a distrait in your house, or you win golden opinions from all sorts of people at the cost of more than fifty per cent. on your income? What a life! Late dinners and late hours, rich repasts or meagre meals, hot assemblies, theatres, and saloons, the close and ill-ventilated bedroom, the use of tobacco, and the absolute necessity of having recourse to wine, spirits, or opium as a solace or support, beneath a vast canopy of smoke, that obscures the air and adjacent country for many a mile in circumference; such is the climax of a mode of life as diametrically opposite to health and happiness as light is to darkness, or earth to heaven!

The laws of nature are never transgressed with impunity. In the physical being of man there is no redeeming power analogous to that of repentance in the supernatural order of faith. Damaged functions are seldom or never restored to their primitive integrity. Their further deterioration may be arrested, but the point at which degeneration halts remains permanently fixed below the normal standard of health. Nought is left but a broken constitution.

But we are wandering from our point. We have forgotten ourselves. Our brown study was caused by the sight of that sickly-looking stranger who has just stepped on board the steamer, and

seems pining for fresh air and relaxation from the toils of office. Where is he going? to the Alps or the Pyrenees? It matters not which, for either will do. No scenery is so exhilarating to an enervated patient as that of the mountains. It is particularly renovating to the worn-out Cit. Everything looks enchanting to him. He can scarcely believe his senses. The sight of those distant giant peaks coquetting with the wreaths of clouds around their lofty summits—their wonderful variations of light and shade, and perspective and form—the valleys between and among them scattered over with villages, farms, fields, streams, cattle, hedges, woods, and pathways, looking so small, clear, and distinct in the depths below; or the sombre pine forests, such as those so ably depicted by Gaspar Poussin, clothing the heights above, below, and around him, vanishing beneath his feet, over his head, or far away, as far as the eye can reach, here, there, and everywhere—unfold a moving diorama or dissolving view that annihilates time and space, and transports the mind in fancy to the land of dreams.

Lofty elevations give rise to singular feelings in the breasts of those unused to them. There is something preternatural in their effect. But there is more than the sensation of novelty and grandeur which they inspire. There is a material alteration of the whole frame. Heights such as those of Mexico, Peru, Bolivia, and the awful Himalayas, produce phenomena, both in animals and men, of the gravest kind. It is styled the Alpine climate, and its effects are everywhere the same. Saussure, on the top of Mont Blanc; Humboldt and Boussingault on the peaks of Teneriffe or Chimborazo; or Moorcroft on the terrible altitudes of the Hindoo Coosh; each and all experienced precisely the same feelings at the same elevations. The diminished amount of oxygen, or the greatly reduced barometrical pressure, or the free electricity so clearly demonstrated by the frequency and severity of thunderstorms, hurried the circulation and breathing, and made the arteries of the head pump with unusual energy. Bodily exertion did not cause it, for those who rode on horseback, or were carried in cars or palanquins, suffered the same. Humboldt's guides bled from the nose, mouth, and eyes—a sanguineous exudation rather than a direct hæmorrhage. Aëronauts suffer in the same way, and so do divers into great depths of the ocean: the mean surface of the earth being the only level adapted to the functions of life. The digestive organs are sympathetically affected. There is a sensation of fulness at the pit of the stomach; loss of appetite, nausea, or vomiting. The thirst is sometimes excessive—a desire for cold drinks, and a positive aversion to wine or spirits, although cordials are by no means prejudicial; indeed, it is astonishing what a large quantity of ardent spirits

can be consumed at these great heights without intoxication. Every traveller mentions this curious fact.

At extreme elevations muscular strength nearly ceases. Beasts of burden sink under their loads and lose their strength much more rapidly than man. They stagger, stumble, fall down, and often die from sheer exhaustion, as their whitened bones abundantly testify along the passes of the Himalayas or the Andes. But the most important effect is that produced directly on the nervous system, signified by giddiness, drowsiness, headache, singing in the ears, and an almost uncontrollable propensity to lie down and sleep. These symptoms occur at the extremest heights. At lower elevations they manifest themselves in a lower degree. Still lower, they give place to a sense of lightness and buoyancy, as if the ground were elastic, and the feet seem to skim along the surface as if flying. The traveller feels himself so braced up and alert, that he can walk farther and more easily than ever he could do on the plains he has just ascended from. Life is sensibly invigorated. There is a kind of intoxication of delight. Hence the benefit to valetudinarians. A prolonged sojourn on the heights takes away all these good effects, and at length does harm. The tongue is parched, the eye bloodshot, the cheeks pale, with a congested red spot in their centre, and the skin ceases to perspire. Very sensitive persons experience these unpleasant sensations at an elevation of five thousand feet above the sea-level, particularly if riding instead of walking. Exercise on foot in general soon restores the circulation.

Animals are affected in the same manner as man, but not in the same degree. When the Spaniards went to Bolivia, they took their cattle along with them, and they found, to their utter astonishment, that their bulls had lost their ferocity and pugnacity. The torédors could scarcely stir up their rage, or, if they did, the bulls fell down at the first encounter or turned tail, to the infinite disgust of the spectators assembled to witness their favourite amusement. Possibly the animals may have become acclimatized at last, for Boussingault witnessed a regular bull-fight at Quito, which is some thousand feet lower than Paz in Bolivia, where the animals first failed. Cats die at 12,000 feet above the sea, from tetanic spasms. Dogs live longer than cats, particularly if born in the locality, but they are often subject to fits, like those of pups. Hares and rabbits live at a great elevation, but the race soon ceases. Poultry quickly die. Horses and mules become acclimatized, but they require the greatest care, and must be allowed to halt frequently in the course of a journey. The Lamas of Peru and the Yaks of Mongolia suffer like the mules and horses. Bears and wolves exist beneath the snow-line. Eagles and condors, those denizens of air, live at an

elevation of 20,000 feet above the sea-level. Butterflies, spiders, and house-flies were observed by Saussure at 12,000 feet, and by Bonpland still higher than that. The chamois, the gazelle, and the izzard, enjoy a free and independent existence among the highest crags and precipices, but then it is their native place, and they are, as it were, to the manner born.

In Europe none of these bodily sufferings are so strongly marked as they are in Asia and America. Those who have ascended Mont Blanc, or, like MM. Desor and Agassiz, passed a day and a night on the glaciers of Aars, have not remained long enough in those inhospitable regions to enable us to form a fair estimate of their injurious effects. It is from travellers who have dwelt for some time on the Himalayas or the Andes that we learn what is the real pathology of those elevated localities. Acute inflammatory fevers stand at the top of the list. Dyspnœa is a very common complaint. It is a kind of asthma, produced by a dry, cold, and rarefied atmosphere. Animals suffer from it as well as man. Natives of the plains, the corpulent, and robust, suffer the most. It is the worst in dry seasons. Among new comers, the digestion, which is at first much distressed, recovers quickly enough, but the dyspnœa and lassitude consequent upon it continue for many months, and in some cases are never cured, except by returning to the lowest levels. The complaint is seldom fatal. There may be apoplexy or pulmonary congestion in those so disposed, but in general it is an inconvenience rather than a disease. The maladies peculiar to hot climates are unknown in the mountains, and ague is cured by a residence among them.*

It is evident that the changes effected within the animal economy by a short residence in these elevated regions are of the most important kind. It cannot fail to be most favourable to the worn-out inhabitant of great cities. The stimulating influence that it exerts on the nervous system in particular is the very remedy that his case requires. The respiration, the circulation, and the process of digestion, are all of them powerfully acted on and promoted. In enervated and wasted constitutions, these beneficial results are the most obvious. But, chief of all, is the good that it accomplishes on the mental faculties. What is most needed, and the least likely to be obtained, in the treatment of mental maladies, not only at home, but also in the same place, and in the midst of kindred associations, is a complete and sudden diversion of thought and feeling. There is nothing within reach so long as the patient is confined to the circle of his

* These remarks are taken from *Les Climats des Montagnes*, par Dr. Lombard. Genève. 1858.

own country, relations, and habitual pursuits. They must be all changed. New scenes, new thoughts, new ways, and new food, are the *primum mobile* of cure. Nowhere can they be found in so ample a degree as among the solitude and grandeur of a mountain pass—such as that of the Via Mala, in the Grisons; or the Port de Venasque, at the entrance into Spain, in the Pyrenees, near Luchon. We appeal to the *initiated*, and ask whether such points of sight can ever become vulgarized or lose their beneficial effects by long acquaintance? They are too unique ever to become commonplace or be forgotten. Like the ocean, always the same yet always new, they fix the eye in wonder, contemplation, and repose; and the novice is satisfied with a feeling of the sublime that is never effaced.

The mind shakes off the phantoms of the past, recovers its tone and manliness, and life is renewed. A rich background is furnished to the drudgery and business of the world. The number of ideas is multiplied. There is no end to the stores of nature. Who would ever have supposed that these solid peaks have a language of their own? and yet the *voices of the mountains* are as old as the days of Strabo; and Humboldt himself uses the expression, which he has borrowed from the ancient geographer, where he is describing the Lipari islands and Phlegrean fields of old.*

An anonymous writer in the *Edinburgh Philosophical Journal*, "On Peculiar Noises heard in Particular Districts," mentions a dull moaning sound that came from the Maladetta in the Pyrenees at a moment when the sky was cloudless, and *Mont Maudit* was distinctly visible in the transparent atmosphere of the south. In his *Views of Nature*, Humboldt mentions the organ-like sounds heard at sunrise on the banks of the Orinoco, proceeding apparently from the granite rocks that had been overheated by the intense rays of the sun the day before.† Mr. Scrope, in his excellent work on extinct volcanoes, states that some rocks absorb moisture, and give it out again with a hissing sound, and a considerable disengagement of air bubbles. The rock called domite is one of these, of which the Puy de Dôme is nothing more than a huge mass. It is a pumice, the product of ignition, and looks grey and naked enough as it towers above the dingy, antiquated town of Clermont-Ferrand, in Auvergne.‡ The clinkstone and trachyte of Mont Mezen, Haute Loire, as well as of Mont Dore, one of the range of Puys, might readily yield a distant reverberation

* *Strabo*, lib. vi. 276. Humboldt, *Kosmos*, v. p. 263.

† The sound proceeding from the Memnonian Statue in the sands of Ancient Egypt might be thus accounted for.

‡ Scrope's *Extinct Volcanoes*, p. 46. Murray. 1858.

from the constant effect of meteoric agencies, detrition, and decay. Mr. Weld, in his recent work on the *Pyrenees*, likewise alludes to the mysterious sounds wandering through the solitudes of the mountains, and answering each other in echoes from height to height. Perhaps these noises may be accounted for by currents of air sweeping round the lofty peaks on high, while a profound calm reigns at their base.* Around the sugar-loaf point of Mont Ventoux, 8000 feet high, in the neighbourhood of Avignon, fleecy clouds may be seen circulating on the calmest day.

But let us descend. The back wheels are locked; the horses are put on the full trot; the drivers shout and smack their whips; the road turns sharp round; the vehicle swings, you overhang the depths below, and a moment afterwards you are driving down the next slope in the opposite direction, to run the same risk at the next sharp turning of the steeply-inclined plane. This desperate experiment is repeated many times before you reach the long-looked-for bottom. The slightest accident to the vehicle, an inadvertence of the driver's, the tripping of a horse, would inevitably send the whole freight over the brink, several thousand feet deep. Had we experienced the same embarrassment on the heights as we did in the valley, our fate would have been sealed. We had just crossed a shallow mountain torrent, and were rumbling along the grassy plain beside it, when the seventh horse, or leader, ridden by a lad *en postillon*, began jibbing, backed on its three fellows behind, and they again backed on the three wheelers, which threw the vehicle awry out of the roadway. One of the conductors alighted, ran to the leader's head, re-adjusted something wrong in the harness, and everything was quickly put to rights; but the same occurrence on the heights would have toppled bag, baggage, horses, and all, headlong over the precipice, and then you would never have heard from your ill-fated contributor again.

* *The Pyrenees, West and East.* By C. R. Weld. p. 194. Longman. 1859.

ART. II.—ON THE DISTINCTION BETWEEN ANALYTICAL AND SYNTHETICAL JUDGMENTS.

BY C. M. INGLEBY, LL.D.

IF it be asked from whom, *par excellence*, do modern metaphysicians derive the substance and method of their systems? the answer must be Immanuel Kant. Slips of his Critical Philosophy have been from time to time grafted upon our native stocks, philosophical and theological, and have borne fruit. Yet even to reflecting minds, Kant's masterpiece—that work which was the result of twelve years' earnest intellectual toil, and was not commenced till he had attained the maturity of his unrivalled intellect—is a sort of *Ultima Thule* or *Timbuctoo* in philosophy. From a distance men speculate as to the philosophical whereabouts of the *Kritik der reinen Vernunft*, and wonder what it is: and some, having learned the reports of the adventurous few who have set foot on the charmed region, assume a familiarity with its matter and method, and glibly smatter the outlandish shibboleth of Kant. By these pretenders the *Critic of Pure Reason* is sometimes spoken of as a system of Subjective Idealism; while among the outsiders who make no pretence, the Sage of Königsberg is regarded as a dreamer who wrote a book to prove that man can scale the heavens by means of a faculty of pure reason. Whereas the fact is, that Kant's system is essentially realistic, and its end may be summed up in one sentence—Speculative Reason is legitimately employed only upon the objects of sense.

The *Critic of Pure Reason* is doubtless a difficult book—1st, on account of the novelty of its method; 2ndly, on account of its thoroughness in enumerating the elements, and expounding the processes of Reason; and 3rdly, on account of the technicalities in which its doctrines are expressed, or rather *involved*. Of these, (1) is an ample justification of (3): and as to (2), it may be sufficient to remark, that if, as Dr. Johnson said, "all shallows are clear," it is equally true that profundity, especially in mental science, is necessarily an occasion of obscurity to the uninitiated, just as the depth of a ravine seems to the distant beholder lost in haze and shadow. All deeps are obscure—till they are penetrated.

On the threshold of the *Critic of Pure Reason* we meet with one crucial doctrine, the misapprehension of which is a bar to further progress. Yet here how many expositors of Kant have been unable to find the clue! It was here that Cousin made a capital error in his *Leçons sur Kant*. The foundation-stones of

all science (physical or metaphysical) are judgments. The understanding is the faculty of judging (according to the senses), and its functions are (1) Conception; (2) Judgment; and (3) Reasoning. The act of judgment is the affirmation (or negation) of *some relation* between two concepts—a concept being the result of that operation of distinct thought which is called Conception. Ordinary logic is conversant with one kind of relation only—viz. Identity. It deals with concepts only as regards their respective quantities, and their relation to one another, as contained and containing. The proposition in ordinary logic simply affirms or denies that *so much* of one concept is identical with *as much* of another concept. With a concept as *such*, logic has no concern. Thus: when it is said that *All men are mortal*, Logic regards only the three incidents of the proposition, (1) the expressed quantity “all” (universal) of “men,” and the implied quantity “some,” (indefinite) of “mortal,” (2) the quality of the proposition, viz., that it is affirmative, and (3) the relation of the quantified concepts (“all men,” “some mortals”) to each other—viz., that “all men” are identically the same persons as “some mortals;” or, what is the same thing, that “mortal” is predicate of “all men.” With the concepts “men,” “mortal,” logic has no concern—that is, with their matter or meaning. Accordingly we may express an affirmative proposition in the three general forms, all A is B, some A is B, A is B, according as A is taken universally, indefinitely, or individually. It must be distinctly comprehended that in each of these propositional forms, A (as also B) may stand for a determinate quantum of knowledge obtained through any of the channels through which it is to be acquired. Now, though logic has no concern with the matter of these concepts, yet in metaphysics (as in physics) account, and very special and exact account, is taken of their content. If Logic demands *How much of them is thought?* Metaphysics inquires *What do they stand for?* Now for all purposes of judgment A and B stand for *concepts* and for concepts only. A, for instance, may stand for a sensation, a perception, an intuition, a reminiscence, an idea, or a feeling—but from what source soever it may be derived, *into a judgment it can enter only as a concept*. Putting quantity, for the present, out of the question, we may say generally that, when it is affirmed that A is B, A and B are concepts only.

Judgments, as to their matter, are of two kinds, judgments *à priori*, and judgments *à posteriori*. There is a school of metaphysics in which the very possibility as well as the actuality of judgments *à priori* is denied. I shall not pause to refute that school; I will merely say that the *à priori* character of several classes of judgments can be substantiated on evidence

as demonstrative as that of any proposition in Euclid. Judgments *à priori*, though coming with, and, in fact, partly constituting our reflective experience, do not depend upon experience; e.g., *Two straight lines cannot enclose a space. The three angles of a triangle are together equal to two right angles.* The criteria of such judgments is their *necessity* and *universality*. We can readily perceive the *impossibility* of two straight lines enclosing a space, and as readily the *impossibility* of the three angles of a triangle being greater or less than two right angles; i.e., we perceive the necessity of the two judgments just instanced. We can likewise see that those propositions are universally true—that, in point of fact, they are not true of such straight lines and triangles as observation, through the senses, can afford us; for such lines have breadth, and are not absolutely straight, and such triangles are bounded by three such approximately straight broad lines; but that they are, nevertheless, true of all *conceivable* straight lines and triangles which the reason can find, through imagination, in the intuition of space.

On the other hand, judgments *à posteriori* not only come with experience, but actually owe their truth to experience, and to experience only, and are only true so far as experience has verified them. Such as, *The sun will rise to-morrow. Roses are either red or white. All animals that divide the hoof are ruminants.* These propositions, if true, are true solely on the strength of our observation on nature.

In the *Introduction* to the *Critic of Pure Reason* (§ iv.) Kant (having premised the distinction I have just drawn) expounds another distinction in judgments, which is as fundamental as the last, and, moreover, so essential to the very existence of the *Critic*, that it may be safely asserted that the reader who is vanquished by any difficulty here will obtain no passport into the region beyond. It is the *pons asinorum* of the Critical Philosophy. Let us see whether it cannot be made plain to all readers of reflection. Kant says—

“In all judgments wherein the relation of a subject to a predicate is thought this relation is possible in two ways. Either the predicate B belongs to the subject A, as something which is contained (though covertly) in the concept A, or the predicate B lies completely out of the concept A, although it stands in connexion with it. In the first case I call the judgment *analytical*, in the second *synthetical*. Analytical judgments (affirmative) are, therefore, those in which the connexion of the predicate with the subject is thought *through identity* [in conception]; those in which this connexion is thought *without identity* [in conception] are called synthetical judgments. We might call the former *explicative*, the latter *ampliative* judgments; since the former add, by means of a predicate, nothing to the

concept of the subject, but only separate it by analysis into its constituent concepts, which were already thought in the subject, although [perhaps] in a confused manner; the latter add to our concept of the subject a predicate which was not at all thought in it, and which [therefore] by no analysis [of that concept] could have been discovered therein."

Kant has been "soundly rated" for his style; and I confess it is possible to produce from the *Critic of Pure Reason* samples of syntactical construction which are barbarous (see *Trans. Æsth.* § 9, ii. for specimens ready to hand).* Yet I doubt if it were possible to mend the foregoing statement. It is precise, explicit, and brief. Is it intelligible? A very short acquaintance with the *Critic* served to give me a probable clue to the sense of this passage; and eleven years' familiarity with Kant's works has served to convince me that the clue I then obtained was all-efficient. It is, however, a fact within my own knowledge, that readers of the *Critic* generally carry away an inaccurate and one-sided impression from Kant's exposition of the distinction between analytical and synthetical judgments.

The first danger is, that the reader will understand nothing about it, but that is comparatively unimportant. The second and greater danger is, that he (or she, for I know one female student of Kant) will superficially understand the foregoing extract, and in metaphysics "a little knowledge" is worse than absolute ignorance. He might carry away either of two impressions.

1. That a judgment is synthetical only where the predicate is not actually expressed in the subject. From this definition it would follow that *A triangle is a figure that has only three angles* is an explicative judgment (which indeed it is), but that *A plane triangle is a figure bounded by three straight lines* is an ampliative judgment (which it is not).

2. That a judgment is analytical wherever the predicate can be discerned *by any process* to belong to the subject. According to this definition, it would follow that *Two straight lines cannot enclose a space* is an explicative judgment; for, if it be expressed thus, *Enclosed space is always bounded by more than two straight lines*, it is not difficult to perceive, by an act of reason, that the predicate must always belong to the subject. It would also follow that an ampliative judgment is in fact nothing else than a judgment which we *cannot* discern to be true, for the moment

* Here is one, which I give in Mr. Heywood's travestied version—

"Everything which is represented by a sense, is so far at all time phenomenon; and an internal sense ought therefore not at all to be admitted, or the subject which is the object of this could be represented by the same (*sense*) only as phenomenon, and not as it (the subject) would judge of itself, if its intuition were simply self-effectivity, that is, intellectual." Kant, however, must not be made to bear the blame of this.

we discover its truth, the predicate belongs to the subject. (Whereas the fact is, that the axiom just enunciated is an ampliative (or synthetical) judgment.)

In the first place, let us consider what an explicative (or analytical) judgment is. It is necessary and universal, and therefore *à priori*. It is founded solely on "the principle of contradiction" (or "the principle of non-contradiction," as the late Sir W. Hamilton called it). If, in the judgment, A is B, the predicate B is contained in the subject A (*i.e.*, as a part of the concept A), it is plain that the judgment is quite independent of any appeal to the testimony of the senses. For, to deny the proposition A is B (which is to deny the predicate B of A) when in fact we already know (and understand) that A contains the predicate B, is to identify the opposed propositions, A is not B, and A is B, which is a violation of one of the laws of thought.*

Ampliative judgments, like explicative judgments, are formulated by the understanding in harmony with its own laws, and therefore of that law which is called "the principle of contradiction;" *but the truth of an ampliative judgment does not depend upon that principle*—for, in denying the truth of such a judgment, we are not involved in a direct contradiction in thought. If the judgment be *à priori*, its denial is simply repugnant to the intuition (Space or Time) from which we derived it. If the judgment be *à posteriori*, its denial is but a denial of the testimony of the senses, or of an inference founded on that testimony.

All judgments, *à posteriori*, then, are ampliative.

Now let us sum up the relations of judgments as distinguished, on the one hand, by the *matter*, and on the other by the *form* of their concepts, *i.e.*, as *à priori*—*à posteriori*, and as *explicative*—*ampliative*.

The class "ampliative judgments consists of	{	All "judgments <i>à posteriori</i> ,"
		and
		Some "judgments <i>à priori</i> ."
All "explicative judgments" and	{	Constitute the class "judgments <i>à priori</i> ."
Some "ampliative judgments"		

Assuming that by this time my reader understands *formally* what an explicative judgment and what an ampliative judgment means, I will proceed to inquire under what *material* conditions a proposition, A is B, expresses an explicative judgment. Kant says it does so if A and B are concepts, and "the predicate B belongs to the subject A, as something which is contained (though covertly) in the concept A." Now it might be supposed that in order to determine whether the predicate B is contained—however implicitly—in the concept A, it is necessary to predetermine the

* On this point, see the K. R. V., Anal. II. § 1.

character of the *term* or *name* A, whether it is *denotative* or *connotative*—i.e., whether it is merely a mark of recognition (as a numbered label on a picture in the Royal Academy Exhibition), or whether it is a name expressing the properties of the concept (as the description of that picture in the catalogue). But in fact this inquiry is not even logical—it is merely grammatical. In metaphysics we have nothing to do with the art of naming—there we are concerned wholly and only with the matter of the concepts.

Now how are we to determine the content of the concept A? Of course, if that name be thoroughly connotative, our work is done for us; but if not we must go to the concept, and analyse it as we are conscious of its content. How then do we express the result of that analysis? By *definition*. A concept may be defined in any of three ways: (1) by its extension; (2) by its intension; or, (3) by any of its distinctive properties; of which (2) only gives us the content of the concept. Hence it appears that we may express the result of an analysis of the concept A, in the form of an intensive definition. (*Intension*, by the way, is a generic term employed to indicate the properties of any object of thought as they form the part or whole of a given concept). We are not called upon to enumerate all the properties of the object, but only those represented by the concept. When we say A is B (i.e. affirm B of A), A is an *ens rationis*, and may be more or less exhaustive of the properties of the object conceived. If A be an *inadequate* concept, it might be hardly possible to form any true judgment on A that was not an ampliation of it. If A be a *complex* concept, it might be hardly possible to form any judgment on A that was not an explication of it. And this Kant himself implicitly admits to be the case when he speaks of the concept of *rectitude* (*Trans. Æsth.* § 91). “No doubt the concept of *right*, as employed by a sound understanding, contains all that the most subtle speculation can evolve from it, though in the ordinary and practical use we are not conscious of the manifold representations (given) in that thought.” But it does not follow that the Idea of Rectitude cannot be the subject of an ampliative judgment, or else the terms Ampliative (Synthetical) and Explicative (Analytical) must be used in a relative sense; whereas, Kant employs them for a material and *qua* absolute distinction.

Let us consider how we conceive objects *à priori* and *à posteriori*. When an object is presented to the senses we form a rough concept of it, which we will call A. Yet, vague and inadequate as this concept is, it comprises all our knowledge about the object. Suppose now that, by examination of the object, a new fact concerning it comes to our knowledge. Let this

addition to our knowledge be expressed thus, A is B, and the resulting concept of the object be written A B. Here the judgment A is B is clearly ampliative *à posteriori*. If we obtain further knowledge of the object, in the shape of predicates, C, D, E, . . . &c., we successively form the judgments, A B is C, A B C is D, A B C D is E, . . . &c. All of these are ampliative *à posteriori*. That is all that Kant means when he says that all judgments of experience are synthetical, the reason of which he thus states, "it would be absurd to found an analytical judgment on experience, because, in framing such a judgment, I have no occasion to go out of my concept, nor, by consequence, to have recourse to the testimony of experience."

We have seen how it comes to pass that our judgments of experience modify our concepts of external objects, so that it is impossible to fix the concept as a standard of reference in any judgment. Such an inconvenience, however, does not obtain in judgments *à priori*. Concepts *à priori* are originally simple. Space and Time are apprehended in their integrity, and not like objects of the senses, piecemeal. Space is accordingly called by Kant a pure *intuition*, (*anschauung*) so also is Time. The simple concept of either of these intuitions (or *projections*, as I should prefer calling them) is (or should be) the same for every man. If in my mind the concept be complex, I am called upon to denude my concept of everything adventitious:—i.e. everything that has accrued to my original concept by acts of the judgment of faculty, until I arrive at a concept which cannot be defined by analysis of its content. The concept has a content; indeed it contains the simple integer (Space or Time) which has been revealed to the consciousness immediately on intuition, and that which is revealed in its integrity is necessarily undefinable. Hence the futility of the attempt of Coleridge and others to define "Life." This is obvious, "Life" is a concept *à priori*, and by consciousness is revealed in its integrity and not by its accidents. But intensive definition can only proceed by analysis of the concept to be defined. Thus it follows that "Life" is not intensively definable. So of all concepts *à priori*. And for the very reason that they cannot be defined, the only explicative judgment that can be formed of them is the co-ordinate judgment, A is A. All such judgments are, of course, analytical *à priori*, and consequently all other judgments wherein the undefinable concept A is the subject must be ampliative. Thus, *Space is of three dimensions*, is an ampliative judgment. The simple concept of Space is the reflex of the single perception of Space, which is the ground of sensuous experience. The predicate here is not contained in the concept. Accordingly we must go out of the concept into the intuition, and learn by the use of reason upon the representation,

that Space has the property of triplicity of dimension. For this reason, our judgment thereupon is a synthesis, and is rightly called synthetical, or ampliative.

Analytical or explicative judgments, though not extending the sphere of knowledge, are yet, as Kant says, very important and necessary as guaranteeing clearness to our concepts. In fact, they lead to intensive definitions of concepts, which, by their very character, are purely explanatory of the subjects of those judgments.

In this place I may, by way of illustration, call attention to the fundamental error of M. Cousin, to which I have already adverted. He writes (I quote from Mr. Henderson's translation) —“It is necessary to distinguish between the axioms of geometry and its true principles. The first are purely analytical . . . The axioms . . . are indispensable, but unproductive . . . the true geometrical principles are the definitions [those of a triangle, a circle, and a straight line, are instanced] which are synthetical *à priori* judgments.” This is not only a slipshod statement, but contains a fatal blunder. Euclid's so called definitions of a triangle, a circle, and a straight line, are not homogeneous. If Euclid's definition of a triangle be taken as his type of a definition, his definition of a straight line is an axiom, and that of a circle is virtually a theorem. *A plane triangle is a figure bounded by three straight lines*, and *A rectilineal is a line that is straight*, are homogeneous propositions, and are rightly called definitions, on the one hand, of a *triangle*, on the other of a *rectilineal*, and both express explicative judgments. *A plane figure that is bounded by three straight lines has the fewest possible number of sides*, and *A line that is straight is placed symmetrically with respect to the space on both sides of it* are also homogeneous propositions, and are rightly called axioms, being both expressive of ampliative judgments and susceptible of being made the basis of a deductive system.

From these considerations it is evident that M. Cousin has not properly discriminated between axioms and definitions in geometry. But he has been guilty of worse than confusion; he has actually reversed their relative values; for geometry owes no more to its definitions than it does to a dictionary, and everything to its postulates and axioms. In geometry, every judgment must be derived from a representation, or construction in space. But those that are explicative merely are easily discriminated from those which are ampliative; for the former owe their *identity* to a construction merely, whereas the latter owe their *synthesis* to an inference which Reason draws from a construction in Space. Thus, *A triangle is a figure of three sides*, is explicative of the representation of a triangle, as it subsists in the subject; but

A triangle has the sum of its angles equal to two right angles, is a judgment of the synthesis of the subject "triangle," and affirms a predicate which is not found in that concept; and that synthesis is an inference from the representation of "triangle."*

In algebra (including arithmetic), according to Kant, all our judgments are ampliative *à priori*. Thus $5 + 4 = 9$, and $v + v' = V$, are alike ampliative judgments. The question is, do we find in the concept 9 the synthesis of 5 and 4? No; for all we find in the concept 9 are *nine units*, and these we cannot distribute in any form (as $8 + 1$, $7 + 2$, $6 + 3$, or $5 + 4$), without having recourse to intuition of number (as given in Time), or to observation on a manifold object (as our hand); in truth, the very fact that in the higher numbers we have to resort to concrete objects (as ciphers), in default of the power of mental arithmetic, proves that we do not possess the synthesis of two numbers in the concept of one: else why need we calculate at all? And these remarks apply, *mutatis mutandis* to quantity, as distinct from number.

While assenting to the validity of Kant's distinction between explicative and ampliative judgments, it may be permitted to any student of his philosophy to doubt as to the propriety of any particular illustration or example. Now in the *Prolegomena to Every Future Metaphysic* (a sort of defence of the previous work, the *Critic of Pure Reason*), Kant gives, *Gold is a yellow metal*, as an example of an explicative (or analytical) judgment. Against which proceeding I take leave to cite Kant's own remarks in his former and greater work, viz., "it would be absurd to found an analytical judgment on experience;" yet sure enough, if *Gold is a yellow metal* be an analytical judgment, it is one that is founded on experience; for it is only by experience that we learn the colour (not constant) of that precious metal which we denominate *gold*. In fact, while *Gold is a metal* and *Body is extended* are homogeneous, both being explicative; *Gold is yellow* and *Body is heavy*, are also homogeneous, both being ampliative; indeed, *Body is extended* and *Body is heavy* are cited by Kant in the *Critic* as examples, the one of an explicative and the other of an ampliative judgment.

Kant seems to have been under the impression that he first expounded and discriminated analytical and synthetical judgments. He does, in fact, in the *Critic of Pure Reason*, point out how near Hume was to grasping the distinction between them; and in the *Prolegomena* he cites "the third head of the

* I do not charge Cousin with confounding explicative with ampliative judgments. He sees clearly enough that the latter must be at the foundation of science. He says, "Les vrais principes géométriques sont des lois synthétiques *à priori*." That is right enough; but his application of it is wrong.

fourth book" of Locke's *Essay on the Human Understanding* as containing a hint of this division of judgments. But, as he says, Locke's remarks are so vague and so little reduced to rules that the distinction hinted at was not likely to attract notice. Now had Kant been acquainted with the works of the "good" Buffier, (as that writer would probably, from his ecclesiastical character, have been designated by the Königsberg Professor), he would have found that he had been anticipated in his celebrated division of judgments by the Frenchman, and that in the most express manner; for Buffier not only clearly discriminates between these two kinds of judgments, but denominates the one kind *Identical* and the other *Conjunctive*, a nomenclature which has some advantages over that generally employed by Kant. The preceding discussion being quite independent of Kant's special expositions, may possibly contain error; but the writer conceives that even if such should turn out to be the case, the doctrine of Kant has in this manner a better chance of being intelligible to English readers, than if it had (according to unvarying precedent) been presented in the prescriptive phraseology of the great teacher himself.

ART. III.—THE GREAT ARCANUM:—THE TURKISH BATH.

CAN it be that the *Great Arcanum*, in search of which active spirits of the Middle Ages plunged themselves into hopeless bewilderment, is no trick of the imagination?—that the *Elixir of Life* and its correlate the *Philosopher's Stone* are no fictions?—that to the wisdom of the nineteenth century is reserved the achievement of unveiling that transcendental mystery which the alchemy of a remoter period and the magic of all ages have in vain attempted to penetrate?—that we may at length clap our hands, and, with jocund voice, cry out "*Eureka*"?

Strange though it may seem, yet it is not less strange than true, that these questions are pertinent to a subject which, at the present time, is justly attracting no small interest among the profession and the public at large. Zealous advocates of the so-called Turkish Bath, which has recently arisen into notoriety among us, men of mark and fame, are boldly attributing to that form of bathing virtues which hitherto (all charlatanism being set aside) have been considered alone possible in the supposititious *Elixir of Life*. Think not we exaggerate; for we are taught by these authorities no less than this—that by opening the flood-gates of the skin from time to time, and submitting ourselves to the manipulations of a shampooer, in the Oriental fashion, we may attain

unblemished health under all circumstances, securing ourselves from the attacks or the consequences of sickness, and controlling or obviating the ill effects of our evil passions. So long, it is said, as we diligently and regularly have recourse to the Oriental bath, neither malaria, nor miasma, nor infection—neither the poison of marsh-fever, nor city-fever, nor of any form of fever whatsoever, can find a lodgment within us. We may hold at bay the direst contagious disorders, or root them out from among us. Nought that is deleterious can keep a place in the system when the pores of the surface are called into full action. All that is hurtful is swept away in the health-giving, health-preserving perspiration which streams forth. We may snap our fingers at blighting scrofula, wasting consumption, and the racking pains of rheumatism and gout. We may rest in assured safety against any curmurring of the stomach and its associated organs. No blotch, no stain, not even the tiniest freckle shall ever spot our dainty skin; no spasm torture our brawny frame; no mischief steal into the chambers of the heart, or damage the conduits of the blood. The mind and the brain—nay, the whole nervous system, central and peripheral, shall hold their own against the deteriorating influences which haunt our daily life. Man, indeed, may confront the world, armed in proof at all points against every danger which may assail his frame, whether wholly or in detail, from morbid agencies, if he will but habituate himself to the use of the Turkish Bath.

Nay, more, if by ill hap, in an unguarded moment, disease should steal in upon us (for no one is cautious at all times), no other medicament is needed than the Bath. Its commoner action is depuration by the skin, but it also acts, we are told, by purgation and diuresis, and is effective as a narcotic and tonic if need be. It is, in fact, a complete *materia medica* in itself. But while the physician might hesitate or doubt, and administer his remedies at haphazard, the Bath operates without let or error, according to the strict necessity of the case; bringing about, intelligently, as it were, the precise remedial action required.*

If we are gluttonous, the Bath will counteract the evil effects of our over-gorging; if dissolute, of our debauchery; if intemperate, of our drunkenness; if slothful, of our sloth. The indolent man who systematically submits himself to the all-healing process can at once start from his indolence, and undergo extreme toil; and the exhaustion of fatigue, the pangs of hunger, the carking cares of life—all yield to its potent influence.

* "It is thus a drug," writes Mr. Urquhart, "which administers itself according to need, and brings no after consequences."—*The Pillars of Hercules*, vol. ii. p. 74.

Premature wrinkles, greyness, the decrepitude of age, and baldness, alike vanish in the Bath ; from its use also the entire surface of the body becomes indifferent to changes of temperature, and we may pass heedlessly and harmlessly from a torrid to an arctic zone, and set at defiance all those insidious currents of cool air which are pregnant with catarrh and a host of annoying disorders. The sensitiveness of the skin to mechanical injury moreover diminishes, while at the same time a more refined touch is developed.

To dwellers in towns the Bath is an efficient substitute for air and exercise, and a sure method of securing perfect health and prolonging life ; to dwellers in the country it is the proper and needful means of thoroughly utilizing the healthful advantages they possess. The Bath, of a truth, not only makes what is healthy more healthy still, but sweeps away all those disadvantages which are commonly thought to be inseparable from insanitary districts, by enabling the inhabitants if they will, with little trouble and less cost, to obtain and maintain a degree of health equal to that found in the most healthy localities.*

Finally, the use of the Bath is as conducive to the perfection of our moral as of our physical powers.

"Do you think I fable with you ?" exclaims Mammon, in the *Alchemist*, speaking of the Elixir of Life—

" I assure you
He that has once the power of the sun,
The perfect ruby, which he calls elixir,
Not only can do that,† but, by its virtue,
Can confer honour, love, respect, long life,
Give safety, valour, yea, and victory,
To whom he will. In eight and twenty days
I'll make an old man of fourscore a child, . . .
Restore his years, renew him, like an eagle,
To the fifth age.

.
'Tis the secret
Of nature naturiz'd 'gainst all infections,
Cures all diseases, coming of all causes ;
A month's grief in a day ; a year's in twelve :
And of what age soever, in a month.
Past all the doses of your drugging doctors.
I'll undertake, withal, to fright the plague
Out o' the kingdom in three months."‡

* "It must always be borne in mind that the thermæ has even a wider sphere ; the Londoner, or the inhabitant of a large city, would live as healthily immured within his city walls as the rustic amid the fields and meadows of the country. His thermæ would be to him in the place of a country house, of a horse ; it would give him air, exercise, freshness, health, and life."—Wilson's *Thermo-Therapeia*.

† i.e., produce gold at will.

‡ *The Alchemist*, act ii. scene i.

Now, not only does an extraordinary parallelism exist, as we may thus see, between the marvellous properties of the Elixir of Life and those attributed to the Turkish Bath, but there is also a very curious analogy between the preparation of the one, and the process of the other. Subtile, when describing his method of projection, says:—

“ I exalt our medicine
By hanging him in *balneo vaporoso*,
And giving him solution ; then congeal him ;
And then dissolve him, then again congeal him :
For look, how oft I iterate the work,
So many times I add unto his virtue.”*

And again,—

“ *Subtile*.—Your Magisterium, now ?
What’s that ?
“ *Face*.—Shifting, sir, your elements,
Dry into cold, cold into moist, moist into hot, hot into dry.
“ *Subtile*.— . . . Your *Lapis Philosophicus* ?
“ *Face*.—’Tis a stone, and not
A stone ; a spirit, a soul, and a body :
Which if you do dissolve, it is dissolv’d ;
If you coagulate, it is coagulated ;
If you make it fly, it flieth.”†

It will be granted that there is a remarkable correspondence in conception between the alchemical processes here referred to, and the different stages of the Turkish Bath. It may, indeed, be reasonably surmised that, supposing the virtues of the latter ultimately justify the assertions of its chief advocates, it will prove to be the *Great Arcanum*, so long and vainly sought for. We can conceive that the Alchemist, led astray by barbaric greed, erred by looking upon Gold as the chief and primary aim of existence, and seeking the prolongation of life solely for the purpose of enjoying riches ; instead of regarding wealth as subsidiary to health. Hence he sought to obtain Gold directly by transmutation of the baser metals, and not indirectly by first endeavouring to promote the fullest vigour of life, and so increasing the capacity of winning riches. Thus he failed to perceive the fact, to us indisputable, that the Philosopher’s Stone, which, as he rightly defined it, was “ a stone, yet not a stone ; a spirit, a soul, a body,” was no elemental body, but simply Man himself, who contains within himself all the essentials of the true Elixir of Life. To educe these, therefore, in all their purity, it follows that it was Man that should have been put into the alembic and distilled, or the crucible and sublimed, and not base copper, or brass, or tin, or

* *The Alchemist*, act ii. scene 3.

† *Ibid.* scene 4.

any other telluric or vegetal substance. This, we may now perceive, can happily be effected in the Turkish Bath, which may rightly be regarded, according to the fancy, and without unduly stretching the imagination, as an alembic or crucible, in which man is subjected to an elaborate process of distillation or sublimation.

Let it not be supposed that we are desirous of throwing ridicule upon the Turkish Bath by indicating the parallelism which exists between its method of operation and reputed virtues, and the method of preparation and the properties of the hypothetical Elixir of Life. We would merely hint the probability that an enthusiasm which approximates its object to the most mystical and least tangible of the alchymical and magical doctrines of the Middle Ages, will be apt to lead to a fate similar to that which has befallen those doctrines. We should deeply regret to see so promising a sanitary movement as that which is now going on for the establishment of Turkish Baths in this country, checked either by the disappointment of exaggerated hopes, or by the too hastily expressed opinions of medical or scientific men being made use of as stalking-horses for charlatanism. It would be idle to assert that the value of the Turkish Bath has been tested in any mode which merits the term of scientific, yet it is by strict observation alone that that value can be determined. We know certain general facts which serve conclusively to show that the use of this bath may prove hygienically of great value, and it is highly probable that in our hands it may become an important therapeutic agent; but at present, both in its hygienic and therapeutic uses, we have not got beyond the bounds of those familiar principles which have hitherto governed the application of hot air, hot vapour, and friction to the body. In facilitating and securing the full effect of these means, either in the preservation of health or in medicine, the Turkish Bath offers mechanical advantages which have never before been possessed in this country, and from the use of which much good may justly be augured; but not so much surely, until the matter has been more thoroughly tested, as would warrant us in elevating the Bath to the dignity of a panacea for all the physical ills of life.

More or less enthusiasm is perhaps inseparable from the use of the Turkish Bath, when once we have become habituated to its luxurious delights; and perhaps it is well that it should be so, if we would hope to secure fully its introduction among us. But still it seems to us that the patent advantages of the Bath are sufficiently great to warrant its adoption in this country, without straining the fancy unduly for arguments. Our own acquaintance with the Bath was formed, where it is, for the present at least, best formed, that is to say, in Turkey. We have

now lying before us the notes that we made after our first introduction to its mysteries, and they may fittingly form a portion of this gossip of ours.

The scene is Stambul: the time early morning. The gutter-like and still deserted streets glow, as it were, oven-like, with the stored-up warmth of many hot days and nights. A slight motion among the luxuriant foliage, which here and there straggles above the walls that hem us in on either side, hints of a breeze coquetting with the blue waters of the Bosphorus and the Sea of Marmora, and provokes longings for a plunge amid the rippling waves, within sight of the snow-clad summits of the Mysian Olympus. But with expectation all a-gog, and imagination inflamed by travellers' stories, we hasten on to the great baths of Sultan Mahmoud, and in a few moments stand within the doorway. The echo of our footsteps, as we crossed the threshold, pleasantly traversed the faint splash of a fountain which occupied the centre of the entrance-hall. Two or three attendants alone were lounging there, and by them we were ushered into a species of gallery, in which we were speedily divested of our garments. A long, soft, white towel was cast kilt-wise about our loins, and another thrown over the shoulders. Then descending to the floor of the bath, we thrust our feet into the loop of a pair of primitive-shaped wooden pattens, and, steadied by two slim, dark-skinned, bath satellites, we hobbled to a door, which, being cast open, admitted us into a large dimly-lighted chamber, filled with watery vapour, and so heated that we literally gasped for breath. In a few seconds the sense of suffocation that had at first seized upon us passed away, and we were enabled to look about us comparatively at our ease. The chamber was capped by a dome; and ceiling, walls, and floor were alike constructed of marble—at one time probably white as the driven snow, but now mottled with many dark stains, and discoloured throughout. To the right and left of the entrance were raised platforms, also of marble, and upon these several of the Faithful were curled up, pipe in mouth, and be-towelled like ourselves. Presently, the perspiration starting from every pore, we were conducted into another, larger, and much handsomer chamber, also constructed of marble, which, from neglect and heat, had long been divested of its pristine beauty. A subdued light was admitted through several small circular openings in a lofty dome, beneath which was a slightly-raised platform. The walls of this chamber were interrupted by deep recesses, within which marble basins, supplied with hot and cold water from brazen taps, projected from the walls. One or two small apartments, provided like the recesses with the appurtenances requisite for completing the process of the bath, and in which privacy could be secured, communicated also with the great

chamber. This was filled with a thin film of vapour, and heated to so great an extent that we became faint, and, but for very shame, we should have fled into a cooler atmosphere. Urged forwards by our attendants, we were led to the central platform, and the towel having been removed from our shoulders, and spread over the marble surface, we were directed to lie down. This we did, but immediately started up, truly in hot haste, so acute was the sense of scorching on our first impact with the floor. With a lofty courage, however, we again essayed to stretch ourselves on the fiery pavement, and, sooth to say, we now contrived bravely to support the first sensation of extreme heat. In a few moments, the skin becoming less sensitive, we were enabled to lie quietly on the back. The attendants, then, seeing that we had become amenable to the routine of the bath, or surmising that we were well-nigh helpless from exhaustion, and must perforce yield thenceforth unresistingly to their behests, left us to ourselves for a short space. We were prompted, at this stage, to exclaim with Antiphanes*—

“Plague take the bath! just see the plight
In which the thing has left me;
It seems t’ have boil’d me up, and quite
Of strength and nerve bereft me.”

In our case, however, we substituted the word *broil’d* for *boil’d*.

We had been laid upon the platform only a few seconds, when the perspiration streamed out of every pore in a marvellous fashion, and from moment to moment we became better able to endure the fervid atmosphere. Anon we managed to look without too much effort upon our fellow-bathers, several of whom were stretched near us, and others were undergoing more advanced processes of the bath in different recesses. It was pleasant and most encouraging to find that they appeared to be really enjoying themselves. Some were chatting and laughing cheerfully with the attendants, the countenances of others bespoke a more sedate delight, and a few even were singing, and ever and anon accompanied their song by striking their resounding flanks with open palm. The many-echoed chamber was filled with a pleasant din. One slim, lithe fellow droned out a most pathetic love ditty, in which he professed that his glowing affection for the loved-one was slowly reducing him to ashes. He might with more justice, we thought, have applied the idea to the scorching floor upon which he was then laid.

But now an attendant had once more taken his place at our side, and kneeling, he began gently to knead our limbs and body.

* Athenæus :—The Deipnosophists.

He applied himself to each limb in succession, then to the trunk ; and finally, having contrived to give more or less motion to almost every joint in the frame, he helped us to our feet, and exclaimed, interrogatively, " Good ? " Good, we were compelled to confess ; for the whole of this process of shampooing was by no means unpleasant, and it was entirely divested of that violence which we had expected would, according to many descriptions, have been attached to it. We were next led across the floor into a recess, and directed to seat ourselves near one of the marble basins. Then our attendant, seizing hold of a metal laver which stood upon the edge of the basin, deluged us from head to foot with hot water. Next arming his right hand with a fingerless glove of camel's hair, he proceeded to chafe the moist and softened skin, carrying the gloved hand in long sweeps from the shoulder to the fingers, from the neck to the loins, and from the hips to the toes. At first the friction was applied gently ; but by degrees the pressure was increased, until we experienced a lively sense of being flayed alive—an impression by no means assuaged by the sight of long rolls of effete scarf-skin rapidly forming beneath the glove. When the sense of flaying was at the height, the attendant suddenly started upon his feet and dashed a laver-ful of hot water over us. For a second or two we thought that we had been scalded, so painful was the sensation of heat, and our first impulse was to pitch the attendant head over heels as he stood, his face distended with a broad grin, eyeing our grimaces. We contented ourselves, however, as was best, with preventing him repeating the scalding affusion. Producing a wooden-bowl containing soap and a long wisp of vegetable fibre, he now dexterously whipped up a thick lather and anointed us with it from head to foot. Then thoroughly washing the soap from the head and shoulders with successive lavers-ful of warm water, he, with a graceful salutation, placed the vessel in our hands, that we might ourselves cleanse the rest of the body. After we had dashed water over our limbs to our heart's content, a towel was again wrapped about our loins and another thrown over our shoulders, while a third was entwined around our head turban-wise, and we were conducted once more into the middle apartment. Here, as may be imagined, descending as we were now from the torrid to the temperate zone of the bath, the atmosphere at first felt somewhat chilly. But this uncomfortable sensation presently passed away, and our attendant having removed superfluous moisture from the skin, by gently pressing upon it the towels with which we were clad, and having replaced these, now damp, with fresh ones, led us into the outer hall. We cast ourselves on the cushioned divan which surrounded the hall, glad to seek repose after the exhausting process we had undergone, and having imbibed a pleasant

draught of cool sherbet, and received from the hands of a juvenile pipe-bearer a stupendous chibouque, we awaited with commendable patience the beatitude promised to those who had truly and faithfully submitted to the ordeal of the Bath.

Nor did we wait in vain. A delicious languor gently stole over us and gradually merged into a pleasing state of reverie, in which we experienced the apathetic and automatic delight peculiar to a condition of the most luxurious laziness. From this state we were ultimately aroused, by the presentation of a cup of black coffee, to a sense of physical well-being which was most agreeable, but which did not expel certain qualms of the stomach, which now prompted us to dress with what speed we might and hasten to the breakfast-table.

Subsequent experience mollified the more obnoxious phases of the Bath, and brought into fuller relief those which were more agreeable ; and, in the end, when habituated to it, the whole process of bathing after the Turkish fashion became a most luxurious indulgence, particularly when we were fatigued either by bodily or mental exertion. But while admitting fully its virtues in this respect, we were far from convinced that it would be well if the Turkish Bath could be largely substituted in this country for other and much simpler forms of bathing. As an addition to those forms we could conceive that this Bath would be most valuable, as a substitute for them probably most detrimental. Thus, in the majority of cases, for ordinary purposes of cleanliness and vigour, the Turkish Bath, in our experience, by no means surpasses, and we question if it equals, in its beneficial effects the ordinary sponge, or shower, or plunge bath, whether warm or cold, with friction. This may, and ought to be, and is most beneficial when it is used daily ; but the Turkish Bath cannot probably be made use of to its full extent more than once a week without giving rise to evil consequences—relaxing the whole system, and lowering the tone both of the body and the mind. But still we have much to learn on this point, for paradoxical though it may seem, we can obtain little dependable information upon the hygienic effects of the Bath from observation of the Turks themselves. Certainly their cleanliness, their excellent physical condition, their exemption from disease, and their temperance, have been paraded in connexion with the use of the particular form of bath which we commonly name after them. Our own acquaintance with the Turks, however, did not lead us to any very lofty notion of their cleanly habits in the strict sense of the term. Granting that by the use of the Bath at stated intervals, the Turk secures an average degree of bodily cleanliness greater than among ourselves, we were led to doubt not only the efficacy of the prescribed *daily* ablutions as means of cleanliness,

but also whether the Turk had any correct idea of what cleanliness meant beyond the forms commanded by his religious customs. And even the mode in which these were carried out, in so far as domestic utensils and domestic usages are concerned, were so little in accordance with our English notions of cleanliness, that we found it absolutely necessary, during several months' residence in Turkey, to insure by personal inspection such methods of "washing-up" and "cleaning-down" as particularly affected our personal comfort. For example, one peculiar matter of domestic contention was the use of special towels for special purposes. The rule of the Faithful appeared to be to use one towel for personal cleanliness, dusting furniture, wiping dishes, and cleaning stew-pans, and it was only by strict watchfulness we could induce them to apply special towels to special uses. One servant, who was with us many months, a splendid specimen of the pure Turk, from Angora, in Anatolia, and who, we flattered ourselves, we had thoroughly inducted into habits of cleanliness, contrived, even at the last moment of his service with us, to give a fresh illustration of Turkish notions of cleanliness. Taking up a tumbler, preparatory to drinking some water, we were disgusted to see at the bottom of the glass a huge bug. (Bugs and fleas, we may remark parenthetically, are the legitimate occupants of the walls of wooden houses in the East). We pointed out the intruder to our faithful Omar, and directed him to eject it, and clean the vessel, when, to our horror and grief, he quietly dislodged the insect with his finger, and then proceeded to wipe the glass with a dirty pocket-handkerchief which he produced from some mysterious fold of his dress.

The best idea of the true value of a Turk's notion of cleanliness is perhaps obtained by observing the Turkish soldier in the field. There, when in presence of the enemy, he is exempted from strict attention to his religious ablutions. Under such circumstances he is, as a rule, except when he has the good fortune to be well officered, as filthy a being as could well be conceived both in person and generally, even when a plentiful supply of water may be at hand. Nay, so little are the notions of cleanliness engrained in him, that he will commonly irretrievably pollute the fountains from which his supplies of water are obtained. The British soldier stands out princely in respect of cleanliness, at least, in the field, compared with the Turkish. The Turk, in fact, from being usually cleaned by others in the Bath, never acquires properly the habit of cleaning himself.

To estimate the part which the Bath plays in securing the physical vigour of the Turks is a difficult task, if not one which cannot be satisfactorily performed. For in considering the ques-

tion, it is not to be forgotten that the Turk abstains usually from all spirituous fluids, and is temperate in his diet—two causes most powerfully conducive to health, and acting contemporaneously with the Bath. Mr. Urquhart, however, has told us that we are “not to run away with the idea that it is Islamism that prevents the use of spirituous liquors : it is the Bath.” But as the practice of cleanliness among the Moslems is governed by their religious creed, and the use of spirituous liquors is as strictly forbidden by that creed as cleanliness is enjoined, we may be permitted to doubt Mr. Urquhart’s assertion. Moreover the use of the Bath is no preventive to the increasing use of intoxicating liquors among Turks of the higher classes, which seems to be taking place in consequence of their more intimate associations of late with less temperate nations.

During the Crimean War the Turkish soldiers, who were commanded by English officers, and regularly fed, maintained a higher degree of health than the English soldiers, even when the health of the latter was at the best. But, before we get to the question of the probable influence of the Bath in bringing about this result, we should first have to determine the influence exercised by age and one or two of the commoner domestic habits of life. The Turkish soldiers, as a rule, were men of maturer age and powers than the English soldiers, and consequently better able to bear the vicissitudes of campaigning. The youthfulness of too many of the latter was one of the most important causes of sickness during the war. Again, the food of the Turkish soldier in the field, when regularly issued, differed not a whit either in character, in amount, or in manner of cooking, from that which he received in garrison or that which he had when at his own home. At the best, the rations of the English army could not be stated to approximate so nearly to the food which he was usually accustomed to, and very commonly they differed widely from his ordinary diet. Life in tent or in quarters presented, also, but a slight difference from the domestic habits of the Turks, as compared with the domestic habits of the English. Finally, the Turk was temperate, the English soldier most intemperate. But, notwithstanding the advantages in favour of the Turks, if Turkish and English soldiers of the same ages were compared, he would have been a bold man who would have asserted that the Turks were the more brawny men. If, however, the sponge-bath-loving English officers were compared with the hot-air-bath-loving Turkish officers, the latter were seen to be as inferior to the former in physical development and vigour and beauty as in mental; yet the serious odds of great temperance in food and drink were commonly against the Englishman.

But who can measure the vast difference between the psychical

condition of the Englishman and the Turk? It has often occurred to us that the mental and physical inertia which underlies, and is, indeed, the essential element of that luxurious state of lazy reverie which is the most immediate consequence of a Turkish Bath, is the type of the normal condition of the Turk, mentally and bodily. Becker, writing of the bath of the ancient Romans, has well said, "Perspiration and appetite, which the earlier generations obtained by corporeal exertion and agricultural labour, were attained by a later race, that lived for the most part in idle inactivity, by means of sudation and hot baths."* This observation may not inaptly be applied to the Turks of the present day, whose present state is certainly a curious comment upon the opinions of those who would hold the Turkish Bath *per se* as being a means sufficient of itself for the physical regeneration of a nation.

The foregoing observations on the Turks are intended simply as hints that it is unsafe to rest any opinions of the hygienic value of the Turkish Bath upon deductions derived from its effects upon the Turks alone, and, we may safely add, their co-religionists.

Of the therapeutic value of the Bath we have still almost everything to learn; but when it is broadly asserted that it is a potent preventive of malaria, fevers, and pestiferous diseases, we would ask how comes it to pass that, in the region of the Turkish Bath, plague is endemic, and malaria as deadly as elsewhere? It may be that the commoner varieties of fever are perhaps not so frequent in the Turkish towns as in our own cities, but there are many links to find in the chain of reasoning before the exemption can be connected with the use of the Bath.

But it may be asked, after all these hints, and inuendos, and doubts, and difficulties, what, then, is the true value of the Turkish Bath? Has it, in truth, any special value at all? The real fact of the matter is, that these questions have to be determined in the Occident and not in the Orient, and an important step to their proper solution, the Bath (thanks, in the first place, to Mr. Urquhart) being now fairly among us, is to get rid of all that orientalism of speech which has contrived to approximate its virtues to those which have hitherto been conceived to be peculiar to the *Elixir of Life* alone.

As a means of thorough cleanliness, and for rousing a torpid

* *Gallus*, p. 327. "Thus [we quote from Becker] Columella judged of his time; and after mentioning Cincinnatus, Fabricius, and Curius Dentatus, complains:—*Omnes enim patresfamilie falce et aratro relictis intra murum correpsimus, et in circis potius ac theatris quam in segetibus et vinetis manus movemus. Mox deinde, ut apte veniamus ad ganeas, quotidianum crudidatē Laconicis sitim querimus, noctesque libidinibus et ebrietatibus, dies ludo vel somno consumimus ac nosmetipsos ducimus fortunatos, quod nec orientem solem vidimus, nec occidentem.*"

system into action, it may well be conceived that this form of Bath would prove a great boon to many dwellers in towns who lead sedentary lives, to those who suffer from brain-fag, and to the workers in several dusty and dirty trades. Leaving the question of the comparative hygienic merits of the Turkish Bath with other forms of bathing undecided, we would note this great mechanical advantage belonging to the former—to wit, that its proper application may be more efficiently secured than that of any other form of bath, from the necessity of the process being carried out, when rightly performed, by an attendant, the bather remaining passive. The mechanical advantages of the Bath, both in construction and method of operation, also suggest that it may become of great use in the treatment of several diseases, which it is not needful to recapitulate here. But when it is asserted that the Bath will prove a *substitute*, under any circumstances, for air and exercise, and counteract the effects of intemperance, debauchery, and gluttony, we must have somewhat sounder arguments than mere physiological reasons, however plausible these may be. We cannot, we confess, put much faith in arguments which ultimately rest, as these do, upon a chemical and electrical theory of life. The reasoning brings too forcibly to mind the learned Mr. Shandy, Senior's, profound dictum, that "The whole secret of health depends upon the due contention for mastery betwixt the radical heat and the radical moisture." "You have proved that matter of fact, I suppose," quoth Yorick. "Sufficiently," replied Mr. Shandy. "Now could the man in the moon"—you know the rest, dear reader.

Let us, by all means, if we can get them, have Turkish Baths attached to all our public baths, as additions to, not substitutes for, them, and to every hospital, general or special; but until we have tested their merits somewhat more severely, let us not assign to them virtues which would warrant the conclusion that the Turkish Bath is the Great Arcanum unveiled. That it may prove so we sincerely hope, but we hope doubtingly.

ART. IV.—THE AMENITIES OF STATISTICS.

It will doubtless be no easy task for many to conceive the possibility of statistics being in any way associated with aught that is agreeable. The very mention of the term is apt to call up dread visions of figures and tables, before which the most hilarious spirit might quail.* Nevertheless, it is a sober truth that even

* "Numbers lie at the foundation of statistics as well as of the other exact sciences. But it would be as great a mistake to assume that figures and tables

statistics are highly capable of being made an efficient means unto an enlivening end, and that statisticians of the purest blood, notwithstanding the peculiar disheartening circumstances under which their lives, according to popular views, might be supposed to be passed, may retain, like the celebrated Mr. Mark Tapley, an exceeding jollity of disposition under those circumstances.

It has become the pleasant custom of the leading statisticians of the chief civilized countries in the world, to meet together from time to time under the auspices of their respective governments. After the happy example of the British Association for the Advancement of Science, these meetings are equally conducive to pleasure and relaxation and the promotion of Statistical Science. Under their influence the science becomes hospitable, and hospitality becomes scientific, and each gains from being brought into intimate association with the other.

The idea of these gatherings of statisticians originated in London at the time of the Great Exhibition of 1851, and the first, under the title of International Statistical Congress, was held in Brussels in 1853. The second Congress met in Paris in 1855; the third in Vienna in 1857; and the fourth in London in July last. The Report of the proceedings of the last Congress (printed by Government, and edited by Dr. Farr) has been recently published, and we propose briefly to touch upon those matters contained in it which we conceive would be of most interest to our readers.*

The Prince Consort presided, and opened the session with one of those happy and well-conceived addresses for which he has become so famed. After welcoming the foreign delegates to this country, he pointed out that Statistical Science was earliest developed here. We are indebted for this honour, Dr. Farr tells us, to Sir William Petty, a physician, born at Romsey, in Hampshire, on 26th May, 1623. He "studied medicine in Paris, in the Netherlands, and at Oxford; and by practising physic, measuring forfeited lands, and speculating in them, he, more fortunate than his successors, amassed a fortune of a quarter of a million. His *Essays in Political Arithmetic* laid the foundation of statistics. He died in 1687."

His Royal Highness then, in the following language, skilfully

express the whole doctrine of statistics, as to suppose that nautical almanacks embody the whole science of astronomy. The sublimest considerations arise out of the numerical laws, expressing either the relations of the parts of the universe, or the relations of the successive generations of men."—DR. FARR.

* Official delegates were present at the fourth Congress from Austria, Bavaria, Belgium, Brazil, Denmark, France, Hamburg, Lubeck, and Bremen, Hanover, Holland, Mecklenburg-Schwerin, Norway, Prussia, Russia, Sardinia, Saxe-Coburg and Saxe-Meiningen, Spain, Sweden, Switzerland, Turkey, the United States, several of the British colonies, and other countries connected with Great Britain.

touched upon the prejudices which so largely exist on the subject of statistics :—

“Gentlemen,” he said, “old as your science is, and undeniable as are the benefits which it has rendered to mankind, it is yet little understood by the multitude; it is new in its acknowledged position among other sciences, and still subject to many vulgar prejudices.

“It is little understood, for it is dry and unpalatable to the general public in its simple arithmetical expressions; representing living facts (which, as such, are capable of arousing the liveliest sympathy) in dry figures and tables of comparison. Much labour is required to wade through endless columns of figures, much patience to master them, and some skill to draw definite and safe conclusions from the mass of material which they present to the student; while the value of the information offered depends exactly on its bulk, increasing in proportion with its quantity and comprehensiveness.

“It has been little understood, also, from the peculiar and often unjustifiable use which has been made of it; for the very fact of its difficulty, and the patience required in reading up and verifying the statistical figures which may be referred to by an author in support of his theories and opinions protect him to a certain extent from scrutiny, and tempt him to draw largely upon so convenient and available a capital. The public, generally, therefore, connect in their minds statistics, if not with unwelcome taxation (for which they naturally form an important basis), certainly with political controversies, in which they are in the habit of seeing public men making use of the most opposite statistical results with equal assurance in support of the most opposite arguments. A great and distinguished French minister and statesman is even quoted as having boasted of the invention of what he is said to have called ‘*l’art de grouper les chiffres* ;’ but if the same ingenuity and enthusiasm which may have suggested to him this art should have tempted him or others, as historians, to group facts also, it would be no more reasonable to make the historical facts answerable for the use made of them, than it would be to make statistical science responsible for many an ingenious financial statement.

“Yet this science has suffered materially in public estimation by such use, although the very fact that statesmen, financiers, physicians, and naturalists seek to support their statements and doctrines by statistics, shows conclusively that they all acknowledge them as the foundation of truth, and this ought therefore to raise instead of depressing the science in the general esteem of the public.”

On the objections which have arisen out of the seeming incompleteness of statistical science in its aims, and its being, as it were, subsidiary to other sciences, rather than a science itself, His Royal Highness observed :—

“But this is in appearance only; for if pure statistics as a science abstains from participating in the last and highest aim of all science—viz., the discovery and expounding the general laws which govern the

universe, and leaves this duty to its more favoured sisters—the natural and the political sciences—this is done with conscious self-abnegation, for the purpose of protecting the purity and simplicity of its sacred task—the accumulation and verification of facts, unbiassed by any consideration of the ulterior use which may or can be made of them.”

The Prince Consort made, moreover, a vigorous protest against the notion that statistics necessarily lead “to Pantheism and the destruction of true religion;” and he further remarked:—

“But we are met, also, by the most opposite objections, and statistics are declared useless because they cannot be relied on for the determination of any given cause, and do only establish probabilities where man requires and asks for certainty. This objection is well founded, but it does not affect the science itself, but solely the use which man has in vain tried to make of it, and for which it is not intended. It is the essence of statistical science that it only makes apparent general laws, but that these laws are inapplicable to any individual case; therefore, what is proved to be law in general is uncertain in particular. Herein lies the real refutation, also, of the first objection [that of pantheistic tendency], and thus are the power, wisdom, and goodness of the Creator manifested; showing how the Almighty has established the physical and moral world on unchangeable laws conformable to His eternal nature, while He has allowed to the individual the freest and fullest use of his faculties; vindicating, at the same time, the majesty of His laws by their remaining unaffected by individual self-determination.”

The opinion that statistical science tends to sap the foundation of religious belief, is of such serious import, and has of late been apparently so conspicuously confirmed by the writings of one of the most popular historians of the day, that we shall be pardoned quoting at length (from the Report upon the Programme of the Congress) the following admirable exposition by Dr. Farr of the fallacy upon which the opinion rests.

“It is the characteristic of the primary statistical phenomena that they are all of vital interest. And it has been found that they are governed by laws; so that a deduction from a given series of observations admits of general application. The past enables us to forecast the future; and the statistical discoveries of one nation are the lights of all nations. If conflagrations break out in cities and destroy a certain number of houses in a series of years, the same number of houses, in proportion, may be expected to be destroyed by fire in the following years, and in other cities. The proportional value of various kinds of property which is destroyed by fire annually fluctuates within assignable limits. The losses at sea in past years enable underwriters to estimate the losses of the coming year, and to provide the necessary insurance. If out of 100,000 children born, 50,000 have been found to live forty-five years, it is probable that out of 100,000 other children the same numbers will survive the same number of years; indeed, it is

probable that the same numbers, or numbers only varying within given limits in the two series, will die year by year until the two generations are extinct. Thus, despite the accidents of conflagrations, the unstableness of the winds, the uncertainties of life, and the variations of men's minds and circumstances, on which fires, wrecks, and deaths depend, they are subject to laws as invariable as gravitation, and fluctuate within certain limits, which the calculus of probabilities can determine beforehand. Upon this basis the great system of insurance rests securely. And all statistical facts have the same character; the phenomena observe a definite order, and the same acts of bodies of men are found by experience to recur with the same intensity under the same circumstances. This holds of crimes, and other acts of the will; so that volition itself is subject to law.

"Shall a system of fatalism be built upon this foundation? Shall it be inferred, because statistical phenomena are governed by fixed laws, that man is a mere spectator of historical phenomena over which he has no real control? Can he study the past and speculate upon the future, but effect no change in the destinies of his race? Are statisticians to found a philosophy which abandons nations to Fate?

"No; for statistics has revealed also a law of variation. The number of houses that are burnt down in a large city usually varies little from year to year while their structure is the same; but if you substitute brick or stone for wood, and stipulate for party-walls, conflagrations still occur regularly, but at rarer intervals. Cities are not burnt to the ground; and the insurance premiums are reduced. Under one system of working, mining operations kill *eight* in a thousand men annually; under another, *four*; and in both systems the proportion over a series of years ranges within limits determinable mathematically. Introduce a system of ventilation into unventilated mines, and you substitute one law of accidents for another. So with regard to ships: some seas are calm, others are treacherous and stormy; different voyages have their several dangers, which can be expressed in numbers; so much per cent. of merchandise is lost on an average. But the dangers of the seas are not uncontrollable. With ill-constructed ships, and bad seamen, you lose a certain amount of human life and merchandise; in good ships, well manned, handled by skilful pilots, on well-lighted coasts armed with life-boats, you still lose life and merchandise by shipwreck, but in greatly diminished proportions. You substitute one law of loss for another. Therefore these events are under control. So the first ocean navigators perished in great numbers. A half, a fourth, a tenth of the crews, died once by scurvy and fever on long voyages; now the rate of mortality is less than *two per cent.* in Her Majesty's navy. Cities were ravaged by plagues in the middle ages; and, until quite recently, their inhabitants died at the rate of four and five in one hundred annually. In London, little more than *two* in one hundred of the population died in the year 1859. Human life has in it, indeed, a fatal element. No man lives beyond a certain age. It is exceedingly improbable that any given person will live over the age of one hundred years. A century is the secular cycle of human life. But it is found that numbers of a generation of men

die at all the intermediate points of time in their allotted century of lifetime ; their course is never completed. The chance of living any part of that time is determinable, and can be expressed by a fraction, like any other probability. Under given conditions the average duration of lifetime is forty-nine years ; under other conditions it is twenty-five years. The conditions remaining the same, the lives of successive generations of men, as they succeed each other, describe the same average number of years ; just as under the same winds the waves would break in equal numbers on the shores of the ocean. That is the law of life. The lifetimes also vary. The chances of life change. So also do the conditions ; and the determination of those conditions on which the variations depend is the great problem which statistical inquiry seeks to solve, and has already succeeded in solving in a certain number of cases. Then it is true that crimes are committed with appalling regularity ; they recur in the criminal returns year by year, and at every year of age ; so definite numbers of successive generations of men commit similar crimes in similar ways ; and it may be inferred from analogy that the majority of men discharge acts of duty, piety, and beneficence with the same constancy. Some races, however, commit crimes of violence in greater proportion than other races. Some classes of the same nation commit theft more frequently than others. Everything else being equal, criminal acts are proportional to the temptations ; diminish the opportunities for crime and you diminish crime. The Guarantee Societies vary their premiums definitely according to circumstances. Under the prevalent system of conducting business with imperfect accounts, commercial companies lose a certain percentage by fraud ; under a better system the frauds will be diminished. The laws of fraud vary. The products of industry also increase as the rewards of industry increase. The theory of rewards and punishments implies that the mind is under control. As men, then, have the power to change the conditions of life, and even to modify their race, they have the power to change the current of human actions, within definite limits, which statistics can determine.

“Statistics enables us to exhibit in definite numbers the great facts of national life ; it also determines the laws of life and action. These laws are constant, under the same circumstances ; and their discovery supplies the means—as insurance—of mitigating inevitable evils. The utility of statistics is still further displayed in its determination of the law of variations, under varying circumstances ; as it points out directly the modifiable causes of life and death, of good and evil, of happiness and misery, of national decay and of national prosperity.”

On the aim of the Congress the Prince Consort thus spoke, and his observations form a fitting epigraph to the report :—

“It is the social condition of mankind, as exhibited by [statistical] facts, which forms the chief object of the study and investigation undertaken by this Congress ; and it hopes that the result of its labours will afford to the statesman and legislator a sure guide in his endeavours to promote social development and happiness. The importance of these international Congresses in this respect cannot be

averrated. They not only awaken public attention to the value of these pursuits, bring together men of all countries who devote their lives to them, and who are thus enabled to exchange their thoughts and varied experiences ; but they pave the way to an agreement among different governments and nations to follow up these common inquiries in a common spirit, by a common method, and for a common end."

Proceeding now to the general business of the Congress, among those subjects which come within the sphere of our Journal, we would first direct attention to the report on the statistics of literature. This claims the attention and must prove of great interest to every practical psychologist. The report was drawn up by Mr. Winter Jones, of the British Museum, and it is couched in a series of propositions which were unanimously adopted by the Congress. The first two propositions run thus, and they will suffice to show the chief objects aimed at, and their bearing upon psychology :—

"(1) The literary statistics of a country ought to embrace all that is the result of the exercise of the human intellect, so far as the same is manifested through the Press. The most ephemeral street-ballad must find a place in its details, no less than the work of the highest scientific character. The Press is called into operation so generally, its use is so necessary for the diffusion of information, so indispensable for the successful accomplishment of many of the most important transactions of life, that its statistics embraces perhaps a wider field than that of any other branch. It affords an index to the material, intellectual, and moral condition of a nation, and if carried sufficiently far, will show the special character of the industry of every country.

"(2) Care ought, however, to be taken to give to its details as little of a critical character as possible. It is very important to know that a particular country has published, in the course of a year, fifty works on palæontology ; but if the contents or character of each were to be given, the result would be an amount of materials, collected at an expense of time and labour, which would soon prove fatal to the undertaking."

The subsequent propositions refer to the definition of terms, and the method of compiling the statistics ; and they enumerate for inquiry, in addition to new works and volumes published annually, the numbers (1) of new editions ; (2) of books published in different languages ; (3) of authors ; (4) of anonymous publications ; (5) of reprints of foreign works ; (6) of printers, showing the number of men employed, or the number of printing presses ; (7) of publishers, subdivided according to the particular class of books published by them, as far as possible, showing the number of works imported by them into each country, and the number exported from each country, in each class ; (8) of second-hand booksellers ; (9) of book auctioneers ; (10) of circulating libraries ; (11) of libraries attached to learned institutions, educational and

scientific ; (12) of public libraries ; (13) of volumes in the above libraries, classified according to a method suggested ; also the regulations for admission to and use of the same libraries, with the number of readers and of volumes used by them ; (14) of works and volumes published by the Government, or by the aid of Government support, whether such support be in the form of a sum of money or by taking a certain number of copies ; and, (15) the number of works, the publication or sale of which has been prohibited by the Government or by the Church.

In presenting the report to the Congress, Mr. Monckton Milnes pithily observed that "the Statistics of Literature are in truth the complement and the crown of the Educational Statistics of a country. We can show by Educational Statistics what we teach, and we may show by our books what we have learnt."

In countries where a compulsory deposit of books exists, such as the *dépot légal* in France, and the deposit of books at the British Museum, the compilation of literary statistics, so far as books are concerned, is quite possible, and it is proposed that the Governments of these countries should be requested to cause lists of such books to be printed. The possibility of carrying out several of the remaining heads of inquiry may also be admitted, although of others it is for the present questionable.

The propositions adopted by the Congress in reference to Army and Navy Vital Statistics, and Military Sanitary Statistics are of great interest. The vast practical value of such statistics has been conclusively shown in our own army, and their scientific importance could hardly be exaggerated. The circumstances under which both soldiers and sailors are placed are peculiarly available for solving some of the most important problems in the development, spread, and geographical distribution of diseases. From the facilities possessed in armies and navies for determining the various influences to which the men are exposed, and the probable effect of those influences, the great and complex questions of health and disease are, among soldiers and sailors, reduced perhaps to the greatest simplicity of which such questions, as a rule, are capable. But these advantages can prove of no avail unless connected with a well-conceived and permanent method of statistical observation. To impress this truth upon different Governments will be one of the most valuable of the services rendered by the International Statistical Congress. Our own Government and that of the United States have alone become as yet alive to the important fact. Since 1835 the military authorities in this country have been becoming more and more conscious of the great advantages which would arise from a system of army vital statistics, and whatever doubts might have remained, these were pretty effectually swept away by the events which transpired

during the Crimean war. It is the intention of the English Government in future to publish an Annual Statistical Report of the Health of the Army. The first report is now in course of preparation.

In illustration of the practical utility of statistical health reports, we may mention two facts stated by Dr. Balfour during the discussion in the Congress upon the Vital Statistics of the Army. Five statistical reports upon the health of the army, in different quarters of the globe, were published, within the fifteen years 1838-1853, and in consequence of the improvements adopted upon the suggestions contained in and arising out of these reports, the mortality in Jamaica, "which in the previous twenty years had averaged 140 per 1000 of the strength, has been reduced so much, that during the last four or five years, it has only averaged 30 per 1000;" and "the mortality in Ceylon, which had amounted to 75 per 1000, has averaged during the second period 38 per 1000."

The propositions agreed to by the Congress were drawn up by Dr. Balfour, Dr. Bryson, and Dr. J. Sutherland, and they form an admirable basis for a uniform system of Army and Navy Vital, and Military Sanitary, Statistics.

The section on Sanitary Statistics was occupied chiefly with discussing (1) a proposal for a uniform plan of hospital statistics by Miss Nightingale; (2) certain heads of inquiry for sanitary statistics suggested by Dr. Sutherland; and (3), a scheme of general sanitary statistics by Dr. Farr.

The advantages sought to be obtained by Miss Nightingale's proposal are best set forth in her own words:—

"Up to the present time the statistics of hospitals have been kept on no uniform plan. Every hospital has followed its own nomenclature and classification of diseases, and there has been no reduction, on any uniform model, of the vast amount of observations which have been made in these establishments. So far as relates either to medical or sanitary sciences, these observations in their present state bear exactly the same relation as an indefinite number of astronomical observations made without concert, and reduced to no common standard, would bear to the progress of astronomy. The material exists, but it is inaccessible.

"With the view of rendering the present stores of observation useful, and of collecting all future observations on one uniform plan, tables have been prepared for recording, on one common form, all the facts of hospital experience.

"They have been already tried in several hospitals, and the results have been sufficient to show how large a field for statistical analysis and inquiry would be opened by their general adoption.

"They would enable us to ascertain the relative mortality in different hospitals, as well as of different diseases and injuries at the same and at different ages, the relative frequency of different diseases and injuries among the classes which enter hospitals in different countries

and in different districts of the same country. They would enable us to ascertain how much of each year of life is wasted by illness—what diseases and ages press most heavily on the resources of particular hospitals. For example, it was found that a very large proportion of the limited finances of one hospital was swallowed up by one preventible disease—rheumatism—to the exclusion of many important cases or other diseases from the benefits of the hospital treatment.

“It has been shown that most of the cases admitted to the hospitals, where the forms have been tried, belong to the productive ages of life, and not to the ages at the two extremes of existence.

“The relation of the duration of cases to the general utility of a hospital has never yet been shown, although it must be obvious that if, by any sanitary means or improved treatment, the duration of cases could be reduced to one-half, the utility of the hospital would be doubled, so far as its funds are concerned.

“The proposed forms would enable the mortality in hospitals, and also the mortality from particular diseases, injuries, and operations, to be ascertained with accuracy; and these facts, together with the duration of cases, would enable the value of particular methods of treatment and of special operations to be brought to statistical proof. The sanitary state of the hospital itself could likewise be ascertained. The statistics of rare diseases and operations are still very imperfect; but by abstracting the results of such diseases and operations from the tables after a long term of years, trustworthy data could be obtained to guide future experience.”

These lucid and valuable observations need no comment on our part. Miss Nightingale's proposal gave rise to an animated discussion, and many suggestions were made, several of which were adopted by the Section and assented to by Miss Nightingale. The practical result of these additions would be “to leave,” as the distinguished Reporter of the Section, Dr. McWilliam, C.B., states, “the forms proposed by Miss Nightingale, and adopted by the Section, as they are, except that an explanatory direction will have to be given on the margin, to point out how certain of the proposals may be incorporated in recording cases. The others will have to be made subjects of separate record in hospital books, from which they will have to be separately abstracted for comparison with the data tabulated on the forms.”

The thanks of the Congress were given to Miss Nightingale for the great trouble she had taken in this important matter; and to mark its sense of the value of her propositions, the Congress recommended that they should be adopted by the Section and made known to the different Governments.

A form for separating diseases from persons on the hospital record, prepared at the request of the Section, by Dr. Berg, the Director of the Statistical Department of Sweden, was also adopted.

Dr. Sutherland's *Heads of Inquiry for Sanitary Statistics*, with the modifications adopted by the Congress, are calculated to prove a valuable aid to the sanitary observer, and will go far to secure a scientific registration of the facts connected with health and disease. His preliminary and concluding observations may be quoted with advantage:—

“A Statistical Inquiry into the sanitary state of any population includes much more than the annual proportion of deaths, and the nature of those diseases which have occasioned the mortality.

“In Sanitary Statistics facts and conditions must go together. We must know the nature of the population, its proportions of ages, sexes, and occupation, before we can compare its mortality statistics for any practical purpose with those of other populations. We must also ascertain by inquiry on the spot *where* the mortality has occurred. This is a very important point. In some parts of a town, the proportion of young children may be much larger than in other parts; and this fact alone would in the former cases determine a higher rate of mortality and a lower mean duration of life than in the latter. Some districts of towns are in a much worse sanitary state than other districts, and would furnish on that account a higher rate of mortality. Before the sanitary state of Liverpool was improved, its mortality, taken over the whole population of the parish, was 1 in 28·75 per annum; but when the fact was examined in detail, it was found that the annual mortality in the healthiest ward was 1 in 41·62, while in the most unhealthy ward it was 1 in 23·50 of the populations.

“Again, the average age of death in the same town was found to be 17; but when this fact was examined in detail, it was found that in the healthiest ward the average age of death was 22·57 years, while in the most unhealthy ward it was 14·93 years.

“But to arrive at the truth, the inquiry must be carried much further. Individual streets must be taken, individual houses must be taken, and even individual parts of houses. By pursuing this method of inquiry, not only are towns compared with towns, but streets with streets, and houses with houses, in the same town. It has been made matter of statistical proof that particular streets, or courts, certain houses, and even certain flats of houses, are less healthy and more predisposed to particular diseases than are other streets, houses, or flats.

“The basis of all true Sanitary Statistics is hence street to street and house to house inquiry. It is in this way that such trustworthy facts can be elicited, as, when compared with other equally well-ascertained facts, can lead to practical sanitary improvement.”

Dr. Sutherland next proceeds to indicate those points which influence the sanitary condition of a population and which admit of statistical classification, and he concludes his suggestions by observing that—

“The time appears to have arrived when accurate sanitary statistics should not only be kept for all branches of the public service, but also by all corporations, municipalities, boards of commissioners, and parish

vestries, for the population within their respective jurisdictions. The whole could be done by a few active individuals, who would take sufficient interest in the matter; and it is to be hoped that anybody, corporate or municipal, will, at no distant period, publish the entire statistics of its population, and especially its sanitary statistics, once every year.

"At present this class of facts, which it is of the highest interest for every community to know, is all but unknown. The facts are there, ready to be classified; all that they want is careful observation and accurate recording. It is by doing so alone, that the natural history, so to speak, of any population can be ascertained.

"The machinery exists. It only requires to be directed. There are officers of health, inspectors, poor-law medical officers, registrars, and private individuals, who would, no doubt, willingly lend their aid in so great a work, if it were undertaken on some general plan."

Dr. Farr's comprehensive scheme for determining the sanitary condition of the population of all civilized states, "contains (to quote the language of the sectional report) very important propositions for arriving at the following objects:—

"First, an accurate statistical estimate of the comparative healthiness or unhealthiness of districts or circumscriptions, having defined and acknowledged boundaries in each nation, as shown by the rate of mortality per 1000, the mean duration of life, and the chief fatal diseases in each district. By the same comparisons the healthiness of the whole nation may be estimated and compared with that of other nations. An important element in the same inquiry is the number of persons suffering from illness sufficient to prevent them following their customary occupations, which Dr. Farr proposes to obtain through the medium of the census, hospitals, friendly societies, and other similar channels.

"Second, to carry the inquiry into the physical state of the population, as indicated by stature, weight, strength, intelligence, indications of health, &c., among groups of the population.

"Third, to include in such a survey the influence of locality, habitation, and occupation on health, with regard to the last of which elements, Dr. Farr has given certain forms of tables whereby the facts may be easily arranged.

"The remaining propositions refer to certain recommendations which were discussed fully by the Section, referring to the publication, at regular intervals, of returns of births, marriages, and deaths; accounts of prevailing epidemics, the appointment of officers of health, and the publication, at frequent intervals, of the reports of such officers.

"The object of the whole being to collect accurate and uniform facts bearing on the health and physical well-being of populations, the results of improvements, as well as the consequences of neglects, and to diffuse the information so obtained for the common benefit."

"The Section," it is added, "cordially adopted Dr. Farr's recommendations, with one or two slight modifications involving more fre-

quent publication of certain reports than was recommended in Dr. Farr's proposals."

In addition to the subjects especially set apart for discussion in the Programme of Proceedings, several papers and propositions were submitted to the Sanitary Section. Mrs. Baines directed attention to the great evils arising from "wet nursing," and made several ingenious suggestions by which, through obstetrical practitioners, medical officers of health, and registrars, more trustworthy information might be obtained on the subject. Dr. E. Jarvis, the president of the American Statistical Association, submitted an important proposition, which was adopted by the Section, for a uniform system of Reports in Lunatic Asylums. A resolution was carried to communicate Dr. Jarvis's proposition to the Commissioners in Lunacy,* the Society of Medical Officers for the Care and Treatment of the Insane, and to the several authorities in such matters in all parts of Europe. Dr. Milroy read a highly interesting paper, containing several valuable suggestions, on the "International Registration of Epidemics." He observed that—

"Hitherto but little has been done in the way of observing and registering the geographical and chronological development and distribution of these diseases over extensive regions of the globe. The researches of inquirers having to the present time been necessarily confined to their own country, it is obvious that, unless like researches are being carried on simultaneously in other countries, contiguous and more remote, some most interesting problems of epidemiology, such as the migratory course of certain epidemics, their recurrence at irregular intervals, their subsidence at one time, and their reappearance at another, can never be hoped to be elucidated. It is worthy of note, that the last sixteen or eighteen years have afforded some most remarkable illustrations of the kind—viz., not only the far more extensive diffusion of the cholera since 1847 than previously, but also the total cessation since 1848 of the plague (with the exception of the recent local outbreak at one part of the Barbary coast) throughout the Ottoman dominions, likewise the springing up in 1849 for the first time of a great epidemic of yellow fever in the Brazils, thence spreading gradually over the entire Gulf of Mexico and West Indian Archipelago, till it reached some of the northerly provinces of the United States.

"Now, what has been done of recent years with so much advantage by the synchronous observation and record in different regions of the phenomena of meteorology, magnetism, and other branches of physical sciences, might probably be undertaken with similar benefit by the registration, on the same plan, of epidemic statistics."

Dr. Milroy, then, after expressing an opinion that there was

* This recommendation was added to the resolution at the suggestion of the President of the Section, the Right Hon. the Earl of Shaftesbury, the President of the Lunacy Board.

more connexion between the development of an epidemic disease in different countries and between the successive appearance of different diseases than has been generally imagined, suggested that a system of synchronous observation might probably be instituted by aid of the Congress. He indicated the diseases which in the first instance should form objects of attention, and those points of their history which specially deserved to be noted.

Mr. Ernest Hart introduced the important subject of the registration of sickness, and it was resolved "that the co-operation of all the different Governments be requested in collecting and publishing returns of sickness and meteorology in their several capitals." Dr. Greenhill directed attention to certain fallacies existing in the statistics of societies for improving the dwellings of the poor under their present form, and offered some suggestions by which those fallacies might be removed, and the establishment of such societies promoted. Professor Simonds, of the Royal Veterinary College, drew attention to the desirability of adopting means for ascertaining the extent and fatality of epizootics and other diseases among animals which are ordinarily used for food. A resolution to that effect, as well as that the authorities should be recommended to obtain the information by appointing for that purpose veterinary and other officers of a similar kind, was agreed to.

We have touched upon many of the points in this remarkably valuable Report of the Congress, which we conceive might prove of interest to our readers, but we are far from having exhausted, even by enumeration, the subjects which come within the province of our Journal, and which are scattered in the body of the Report and in the Appendix. In the former, many interesting and important facts, immediately bearing upon the physical and moral condition of man, are to be found disseminated throughout the different discussions and reports; and in the latter are several most valuable and suggestive papers. We may notice, for example, Mr. Gompertz's paper, "On one Uniform Law of Mortality from Birth to Old Age, and on the Law of Sickness," Mr. T. R. Edmonds's observations on the Statistics of Health, and Dr. Jarvis's deductions on the comparative liability of males and females to various kinds of crime. These deductions are of singular interest, and they are derived from the records of somewhat over 65,000 committals to prison in which the sex and crime were given.

"I analysed these," Dr. Jarvis writes, "into two classes, first of the two sexes, and next of the crimes committed by each, and then determined the proportion of each crime to the whole number of crimes of each sex, and then compared these with each other, with the following result:—

"Among these criminals and convicts thus presented to me, most of violations of the law by males were crimes against persons and against property.

"Most of the females were committed for crimes of intemperance, lasciviousness, night-walking, &c.

"A majority of the males were committed for crimes that grew out of their intellect, and which required thought, plan, and reason for their execution.

"A majority of the females were committed for crimes that grew out of their physical organization—the indulgence of their appetites and bodily passions.

"A majority of the male crimes were those in which the violator of the law determined to benefit himself and to injure another.

"A majority of the female crimes were those in which they had no intention of injuring others, but in which they were inevitably sure to injure themselves.

"A majority of male crimes were crimes of selfishness.

"A majority of female crimes were crimes of self-sacrifice.

"From the same cause or origin of crime, the inducements to transgression for which most of these females were imprisoned, are more permanent and less under their own control, when once yielded to, than those which lead the males into error.

"Passion and appetite being inherent or excited in the animal constitution, or permitted to govern the individual to whom they belong, are not so easily nor so commonly repressed by the ordinary punishments, or restrained by repentance and reason, as the misplaced selfishness which endeavours to succeed by plan and calculation.

"As a consequence, these records, thus analysed, showed that the repetition of the crimes, and the return to prison by those whose crimes were of the physical nature, were more frequent than by those whose crimes were mostly connected with or aided by their intellect.

"These records alone showed, that of the inmates of the prisons reported, a thousand males were convicted and imprisoned somewhat less than two thousand times, while a thousand females were convicted and imprisoned nearly four thousand times.

"Of course the last inference is subject to the correction from other causes, such as that criminals, against property and persons are more migratory than the intemperate and lascivious, and therefore less likely to reappear at the same prison, and be recorded among the re-committals. Yet here is a very great difference of repetition, which must be charged to the difference of persistence of the origin of transgression.

"These are deductions from only a limited field of observation—from less than sixty-six thousand imprisonments.

"The number of facts may not be sufficient to establish the principle as to the comparative liability of the different sexes to different classes of crime, yet they are enough to indicate a further examination in the same field; and if the deductions here drawn be corroborated by a wider survey, then it will be for legislators and jurists to consider whether the Government and people should endeavour, by the same

means, to repress and prevent crimes that have such widely-different origins, and to reform criminals whose temptations and power of resistance are so diverse."

In bringing this article to a conclusion, we would refer to one point more. In the course of the discussion upon a highly-valuable paper by Dr. Guy on *Statistical Methods and Signs*, exception was taken to his use of the term "statist" as the synonyme of and preferable term to "statistician," and the phrase "science of statistics." Dr. Guy "contended that there was a science of statistics, and that, practically, whenever we use the word 'statistics,' we mean the Science of States, irrespective altogether of the political discussions and differences prevailing between practical politicians." He further stated that his "reason for using the word 'statist' was that several of our old writers, Shakspeare, Beaumont and Fletcher, and others, have repeatedly used the words 'statist' and 'statism,' and evidently meant by them something analogous to statesmanship in politics; but there are two or three passages in the older writers which clearly show that the word 'statist' was used to characterize the scientific as distinguished from the practical politician or statesman. The word 'statistician,' according to our most common use of the term, would be such a person—a scientific speculator upon matters of government and statesmanship." He therefore thought he was justified in using the word "statist" in place of "statistician;" he also liked the word for its shortness, and for its being a good old English word. Dr. Farr agreed with Dr. Guy in the use of the word "statist," and he has used it in the sense of "statistician" throughout the present Report.

It is not without diffidence that we join issue with two such authorities, but we cannot avoid the conclusion that Dr. Guy, in the use of the word "statist" wrests it from its proper meaning. "Statist" was a term in use as signifying a statesman or politician in the ordinarily received sense of the term long before the term "statistics," or the need of that word, existed; and unless the meaning of the latter term be made co-extensive with the whole science and art of government, the former cannot be legitimately used to designate an adept in statistics. But Dr. Guy shows, in his own use of the word "statistics," and the phrase he would adopt as an equivalent—"Science of States"—that these terms are not synonymous with "politics." If we turn to the standard dictionaries of the English tongue, we find the respective meanings of "statist" and "statistician" accurately set forth. In the *Imperial Dictionary*, for example, we find—"Statist (from state), a statesman; a politician; one skilled in government."—"Statistics—that part of political science which is concerned in collecting and arranging facts illustrative of the

condition and resources of a state or country, chiefly in relation to its extent, population, industry, health, and power, &c.”—“*Statistician*—one versed in statistics.” Unless the correctness of these definitions be disputed, we cannot well conceive that the word “statist” can be rightly substituted for “statistician,” or “statistics” for “science of state.” Lord Palmerston would be correctly described as a “statist,” and Dr. Guy as a “statistician” (each also of the highest eminence), but would the converse hold good?

ART. V.—WHO IS A DOCTOR?

THE equanimity of the profession has of late been somewhat ruffled from time to time by the agitation of a question which, to the uninitiated, might seem to imply that the dignity of medicine, as represented by orthodox practitioners of physic, was, in some inexplicable manner, at stake. The differential characters of a Doctor constitute the subject-matter of the disputation—*Who is a Doctor?*—Who is *not* a Doctor? The late M. Ferrus, on one occasion being a guest along with sundry literary and scientific celebrities at the house of Alibert, and the conversation having fallen upon the trades and professions of France, asserted that of all professions medicine was undoubtedly that which was most followed, not only in Paris, but in all countries. Every one dissented, and Alibert foremost of all. “Why,” said he, “there are not a thousand doctors in Paris, and some villages in the provinces have no doctors at all.” Ferrus, apparently silenced by the overwhelming majority against him, ended by saying that he was sure that the company would ere long find that he was right. In the course of the evening, throwing himself into an arm-chair, and burying his face in a handkerchief, he began to groan most piteously. In an instant he was surrounded by the whole party, who sympathizingly inquired the cause of his distress. “A violent toothache,” was the answer. “Go home, and gargle with warm milk,” said one; “Put a little cotton-wool steeped in laudanum into your ear,” said another; a third recommended a poultice of boiled figs; a fourth a stocking-full of hot sand; a fifth (and this no less a person than Humboldt) the repetition of some charming couplet which Brazier had just sung; and so on until each of the company had recommended some infallible recipe. When the last of the panaceas was exhausted, Ferrus, throwing away his handkerchief, and desisting from his grimaces of feigned agony, burst into a hearty laugh, saying, “Well, was I not right?”

You are all doctors, and have each furnished me with a prescription. In France no one believes in medicine, and yet each one is a physician. Will you still venture to deny that my assertion was correct?"*

The true question at issue, however, in the present discussion is not who is duly authorized to practise the art and science of medicine upon Her Majesty's lieges, but who is entitled to use the style and title of Doctor of Physic?—and still more explicitly whether the licence of a College of Physicians, or degree of Bachelor of Medicine, gives the holder rightfully the privilege of designating himself Doctor, and attaching to his name the honourable letters M.D.?† But for the fact that the question has arisen, it is almost inconceivable that it should have arisen, since it is not easy to imagine that the relationship between a simple licence to practise, and a scholastic degree of the highest grade, is so close, that the former could be regarded as equivalent to the latter,‡ or that the lowest degree of a faculty should confer the right of assuming the highest. But, be this as it may, it is undoubtedly the common usage both for Physicians who are simply such, and for Bachelors of Medicine, not only to style themselves, but to be styled Doctors, as if Doctors of Medicine.

Mere convenience, setting courtesy aside, would, it may readily be believed, lead to the appellation of Doctor being given to the Bachelor of Medicine practising as a physician, and to his adopting the title of the highest degree of his Faculty in ordinary life. Beyond the precincts of his University, the lower and less familiarly-named degree would have no meaning, while practically it yielded all the advantages of the higher and more familiarly named. Again, until a comparatively recent period, from medical instruction being confined to Universities, the orthodox Physician was almost of necessity a graduate in medicine. Hence, in the eyes of the people, the Physician became, and was for ages identified with, the Doctor of Medicine. The Physician, by virtue of a simple licence to practise as such, only dates from that by no means remote period of time when schools of physick sprang up apart from Universities. But, since in his professional relations with the world at large the Physician *per se* differs in no

* We are indebted to the Paris correspondent of the *Lancet* (April 6, 1861) for this interesting anecdote of M. Ferrus.

† The new order of Licentiates of the College of Physicians of London are expressly debarred from adopting the title of Doctor, and we believe also of Physician, upon the strength of the licence alone. The present *Member* of the College is the equivalent of the *Licentiate* prior to the adoption of the recent regulations affecting general practitioners. The Member is, indeed, the Physician proper of the present arrangements.

‡ The King's and Queen's College of Physicians of Ireland claims for its *licentiates*, by charter, the right to the title of Doctor of Medicine.

respect from the Doctor of Medicine practising as a physician, public faith in the belief that the terms Physician and Doctor of Physic are of the self-same value has not been shaken, and convenience and courtesy have helped to maintain the custom of addressing the Physician, under all circumstances, by the style and title of Doctor.

Common usage, however, forms but an unstable foundation upon which to build a rightful claim to a title which especially appertains to, and is the distinctive mark of, a University degree. It is argued, therefore, in addition, that the Physician, in so far at least as his medical training is concerned, stands fully on a par with the Doctor of Medicine, and indeed, that his licence is in many instances a diploma of greater merit than the degree of several Universities. This may suffice to show the worthiness of the Physician's licence, but not to prove that it justifies the possessor in asserting the right to add on that account the term Doctor to his name—for Doctor is properly no addition but a degree (*quia gradatim et progressionē Doctrinæ provenit*). And admitting even that the degree has been prostituted in several Universities, this surely can be no reason for divesting it to a still greater extent of its legitimate signification.

It is by no means a new thing to attempt to elevate the status of the Physician at the expense of the Degree in Medicine, although it is a somewhat paradoxical method of proceeding, by which, as in the present case, additional dignity is sought by dragging what we aim at down to our own level. In the earlier contentions of the College of Physicians with graduates of the Universities, the College, notwithstanding that it was then comparatively a recent creation, boldly sought to place itself on an equality with, if not to take the wall of, the Universities. But it is not to be forgotten that in that day the licentiates of the College were without exception graduates, and it is to be presumed they conceived that their licence added fresh lustre to their degree. Lord Chief Justice Coke, however, observed, in the celebrated case of Dr. Bonham, that "Because that much was said in commendations of the Doctors of Physick of the said College within London" [not, be it remarked, meaning to imply that they were Doctors of Physic because members of that College, but simply speaking of them according to the degree which as previously observed they possessed], "and somewhat as he conceived in derogation of the dignity of the Doctors of Universities, he first attributed much to the Doctors of the said College within London, and did confess that nothing was spoken which was not due to their merits; but yet that no comparison was to be made between that private College and any of the Universities of Cambridge and Oxford, no more than between

the Father and his Children, or between the Fountain and the small Rivers which descend from thence. The University is *Alma Mater*, from whose breasts those of that private College have sucked all their science and knowledge (which I acknowledge to be great and profound), but the Law saith, *Erubescit lex Filios castigare Parentes*. The University is the fountain, and that and the like private Colleges are *tanquam rivuli*, which flow from the fountain, *et melius est petere fontes quam sectari rivulos*. Briefly, *Academiæ Cantabrigiæ et Oxoniæ sunt Athenæ nostræ nobilissimæ, regni soles, oculi et animæ regni, unde Religio, humanitas et doctrina in omnes regni partes uberrimæ diffunduntur*. But it is true, *Nunquam sufficiet copia laudatoris, quia nunquam deficiet materia laudis*; and therefore these Universities exceed and excel all private Colleges, *tanquam inter viburna cupressus*. And it was observed that King Henry VIII. his said Letters Patent, and the King and Parliament in the Act of 14 H. VIII., in making of a Law concerning Physicians, for the more safety and health of men, therein have followed the order of a good Physician (*Rex enim omnes artes censetur habere in scrinio pectoris sui*). For, *Medicina est duplex, removens et promovens; removens morbum, et promovens ad salutem*. And therefore five manner of persons (who more hurt the body of men than the disease itself) are to be removed. 1. *Improbi*; 2. *Avari, qui medicinam magis avaritiæ suæ causâ quam ullius bonæ conscientiæ fiducia profitentur*; 3. *Malitiosi*; 4. *Temerarii*; 5. *Inscii*; and of the other part, five manner of persons were to be promoted, as appeareth by the said Act, *scil.*, those that were, 1. profound; 2. sad; 3. discreet; 4. groundedly learned; 5. profoundly studied. And it was well ordained, that the professors of Physick should be profound, sad, discreet, &c., and not youths who have no gravity and experience; for as one saith, *In juvene Theologo conscientiæ detrimentum, in juvene Legista bursæ decrementum, in juvene Medico cœmeterii incrementum*. And it ought to be presumed every Doctor of any of the Universities to be within the Statute, *i.e.*, to be profound, sad, discreet, groundedly learned, and profoundly studied, for none can there be Master of Arts (who is a Doctor of Philosophy) under the study of seven years, and cannot be Doctor of Physick under seven years more in the study of Physic."

The Doctor of Medicine, indeed, is, by virtue of his degree, necessarily a physician, but the physician is not, by virtue of his licence, necessarily a Doctor of Medicine. Letting, therefore, the common usage of addressing the physician as "Doctor" stand for what it is worth in courtesy or convenience, we dissent from the proposition that the physician's licence entitles the holder to the same honorary appellation as the Doctor's degree.

It is curious that this question should have arisen at a time when the degree or title of Doctor is no longer the distinctive mark of the Physician, but is common also to the Surgeon and General Practitioner. That exclusiveness which so long, and so injuriously to the best interests of physic, restricted the practical utility of a Doctor of Medicine's degree to a physician's duties, is passing away; and the degree is being rapidly restored to its true position and dignity as the culminating distinction of medicine in its entirety, and not as the symbol of one branch of medicine only. The degree, in fact, is becoming divested of the class character which heretofore was so strongly attached to it; and it is now rightfully borne alike by the general practitioner, the surgeon, and the apothecary. Unhappily, this change of feeling, in the beginning, was turned to profitable account by sundry Universities, and facilities were offered by them for obtaining degrees, which threatened in the end to make the title of "Doctor" a term of contempt in the eyes of the public. At one time it seemed not improbable that the title might become of as little estimation as with a certain Wensleydale dame, who, on being asked why she persisted in calling a charlatan of local celebrity *Doctor*, instead of *Mister*, he having no right to the medical title, replied, "I'll call him nought else. What mun a body *mister* sic chaps as him for? *Doctor's* good enough for sic-like folk."

The more culpably lax methods of granting degrees are, no doubt, now pretty effectively curbed by recent legislation, and by the growth of a more healthy feeling among the profession as to the true value of a degree. The question of *Who is a Doctor ?* shows, however, that even among the ranks of those who have been customarily looked upon as the elect of the profession, there is still something to be learned before the dignity of the medical man is rightly apprehended. For our own part, we do not see the need of any adventitious aid to the time-honoured name of Physician, and we would hold up as an example worthy of honour that gentleman who, possessing solely the Licence of the College of Physicians, is content to describe himself upon his door-plate as, *Mr. —*, Physician. If, however, the present discussion should be persisted in, we would suggest that an extra-academical claim to the title of Doctor will probably be most surely maintained upon a dictum of the Lord Chief Baron in the case of *Ellis v. Kelly*, to wit, that "If a man be registered, he may call himself what he likes."

ART. VI.—THE GHEEL QUESTION.

BY J. MUNDAY, M.D., OF MORAVIA.

“Et tamen movetur.”

THE *Psychological Journal* has at various times admitted articles on Gheel, but since last year it has been so *tolerant* as to open its pages to the “pros” and “cons” of this important question of mental science.* We have said “tolerant,” not without a meaning, as we have unfortunately experienced that some journals *systematically refuse* every article in defence of Gheel, yet argue in every number against the colony. We wish it to be understood that this charge is particularly directed against the *Allgemeine Zeitschrift für Psychiatrie*, published by Hirschwald, of Berlin, and refers especially to recent articles on Gheel. The author of these articles is the Geheimrath Dr. Flemming, of Schwerin, formerly director of the celebrated asylum on the Sachsenberge, near Schwerin, a gentleman who has not only distinguished himself by his practical abilities, but has made a name in our science by his splendid writings. If, notwithstanding the position of this high priest in the art of Phrenopathy, we undertake to write against his views, we who have hardly entered the portals of this temple of science, it will necessarily be our endeavour to deal only with the question at issue, and not with the person. We do not feel unqualified for this undertaking, as we have devoted many years to this especial subject, and have been on several occasions at Gheel, and the last time spent several months there occupied in theoretical and practical studies. We do not intend to enter into the criticisms which Dr. Flemming has published on the articles of Professor Parigot, of Brussels.† To some of these we have only lately written a reply.‡ We shall also not discuss the communication which Dr. Willers Jessen addressed to this journal, and we shall treat with silent disdain the “Dymphna” history, which has really become intolerable.§ We have already expressed our views in reference to the opinions of our esteemed

* Refer to the January part of 1857, and the July number, 1860, of this Journal, pp. 277 to 291; and again, October part, 1860, pp. 600, 602, and 612.

† Refer to the *Allgemeine Zeitschrift für Psychiatrie*, 1860, vol. xvii., part iii., p. 366; part iv., p. 751; and part v., p. 805.

‡ Refer to the *Correspondenz Blatt der deutschen Gesellschaft für Psychiatrie* Neu-Wied, 1860, No. xix. and xx., p. 300.

§ Refer to the October part, 1860, of this Journal, p. 612.

English confederates, Drs. Brown and Bucknill, in other places.* If we therefore again throw down the gauntlet to our friends beyond the Rhine, we do it, not for the purpose of disputing mere phrases which appear to us trivial,† but to deal with subjects, the importance of which is still too much undervalued, because as yet misunderstood. We only hope that our antagonists will not desist from controversy with us, but will readily enter into a question which can only be decided by a thorough investigation. These few words may be looked upon as an introduction to our article, whose object is chiefly to comment on those questions which Dr. Flemming forwarded to the general meeting of German physicians which assembled at Eisenach on the 12th and 13th of September, 1860, having been ourselves prevented by illness from appearing there personally. We shall presently quote the wording of the questions laid before the meeting, as also the replies which were written down by the secretary, Dr. Heinrich Laehr, and published in a separate report which was circulated in the *Allgemeine Deutsche Zeitschrift für Psychiatrie*, 1860, vol. xvii. part 617. As we were not present at this meeting, we regret that the discussion of these questions has been entirely omitted, and only the summary replies communicated. As far as we can understand, it would appear that great objections were made to non-professional gentlemen entering into the discussion. This doubtless refers to M. Jules Duval, of Paris, as no other person out of the medical profession has, to our knowledge, ever made a serious study of this question.‡ We necessarily exclude articles in newspapers, and other popular journals, but M. J. Duval is a non-professional gentleman of an entirely exceptional cast. Forgetting for a moment that this celebrated Frenchman is one of the most esteemed writers in the *Journal des Débats* and the *Revue des Deux Mondes*, he possesses the great advantage of having personally examined the subject, for he has visited Gheel, a thing his antagonists have hitherto neglected to do. M. Duval is, besides, a philanthropist, endowed with great experience, who has practically laboured in this field of science, a man of extended philosophical education, combined with a warm heart, and an untiring industry in all that

* Refer to the *Deutsche Klinik*, 1858, Nos. xix. and xx.; further, to the *Allgemeine Zeitschrift für Psychiatrie*, 1859, vol. xvi., p. 442; compare with it our two articles in the *Journal de Médecine à Bruxelles*, May, 1860, p. 451, and August, p. 220; further, the *Asylum Journal*, April, 1858, p. 202, and January, 1859; also *Revue des Deux Mondes*, November 1, 1857; and, lastly, *Allgemeine Zeitschrift für Psychiatrie*, 1858, vol. xv., p. 412.

† This refers to a criticism of Dr. Flemming on the translation of the word "Flitterstaat," wrongly rendered by "frivolité," better by "faux brillant;" compare *La Presse Médicale Belge*, 1860, No. xxxv., August 19, p. 277, and note 2 of this article, the last quotation, as well as note 3 of this article.

‡ Refer to Jules Duval's *Gheel une Colonie d'Aliénés vivants en Famille et en Liberté*. Paris, 1860. Guillaume et Cie.

is noble and elevated—these qualifications indubitably give him a right to be heard. So much on the subject of this estimable non-professional gentleman. We must add, that we are of the number of those who are ready to enter the lists with the *dilettanti* in our science, and are always anxious to avoid appeals to public clamour, if our antagonists be only content to fight with more equal weapons. The following are the questions Dr. Flemming forwarded to the Eisenach meeting:—

1. Is it still a pressing question whether the asylums of the various states and provinces of Germany, with their present population, are judiciously managed and sufficiently cheap to keep the incurable, or detain those lunatics who may require it?

2. Are we to consider the discussion closed on the much recommended imitation, as a relief to the asylums, of the Belgian colony for lunatics at Gheel, which is repeatedly urged by Belgium, and are we to consider the question rejected?

3. Are we to wait for final information on the last assertion of Parigot, that, according to the number of recoveries in the colony for lunatics, the most favourable conclusions may be drawn as to their cure?

4. If the questions 1 and 2 are affirmed, how can the requirements of the public, of sanitary police, and humanity be best satisfied, in reference to the keeping of the patients, and what kind of financial relief can be given to the states?

Either—

a. By the proposition of a plan for more simply constituted and less costly asylums; or

b. By the creation of a colony for lunatics relatively united beyond the frontiers of their states.

What principles should be adopted for their guidance?

The meeting thus replied to these questions:—The first question regarding the best and cheapest method of keeping the incurable, and detaining the other lunatic patients, is still a very important and pressing one: the imitation of the colony for lunatics at Gheel, recommended as a relief, is to be rejected: the experience of the last ten years has proved that it is possible to reduce the building expenses of lunatic establishments by adopting a simpler style of architecture: it is desirable in building an asylum to profit by the advice of a scientific Committee of Physicians: that with reference to the question of colonies in conjunction with these establishments, it shall not yet be rejected, but be kept open, to be more fully discussed with new propositions to be brought forward at the next meeting.

We will now endeavour to comment on these questions analytically.

1. What alienist physician could give a negative to this ques-

tion? There is a general complaint all over Germany, which can be daily heard in the asylums, of the increasing lunatic population. Almost all German asylums are trying to increase their space by additional buildings. In almost all German States there are either new buildings for these purposes commenced or they are projected. In Austria alone, 5; in Prussia, 2; in Hanover, 1. It is not surprising, therefore, that this question should have been affirmed, but it is surprising that it should have been necessary to put it at all in face of these facts. It seems that the question has been raised chiefly as a basis to the following:—that this is a fact, not only in Germany, but all over the world. In Holland, the country we acknowledge as the model of our department, we find the great Schröder van der Kolk at present occupied with the plan of a central asylum for all incurable cases, as the lunatic population in all asylums of Holland has “increased” enormously. Belgium possesses fifty asylums, and only one Gheel; but all those in whose hands the management of this subject rests look to the latter, and are anxious to find a remedy by establishing a second Gheel in Ardennes. In France we find every year an increase of both private and imperial asylums for lunatics. Russia is much occupied at present with a complete reorganization of its asylums; such is also the case in Denmark, Sweden, and Norway. Spain sanctioned a competition of the whole world to project a new model establishment near Madrid, and sent commissioners all over Europe, in order to gain information on the subject. Switzerland is now building new asylums. Italy and Portugal complain of their insufficient and antiquated arrangements, and are anxiously wishing to reform them. England, which formerly concentrated this branch too much, now seeks to separate it, and the lunatic physicians of Scotland personally acquainted themselves at Gheel with the principles necessary for the future organization of their own lunatic asylums.* In the states out of Europe, including Turkey, which to this day remains indifferent as to the welfare of lunatics, we find, both in North and South America, only private asylums, large and small, and merely erected to gain money by their scientific arrangements. Grand new palaces (*hôtels garnies prisons*) are daily established, which are called asylums. There are, however, some respectable institutions, and creditable exceptions.† Holland is trying, through the endeavours of the

* The following Scottish physicians have visited Gheel:—Dr. Coxe (twice), Dr. Mitchell, and Dr. Sibbald, all three from Edinburgh. Dr. Browne, one of the Commissioners in Lunacy, of that country, also published his views on Gheel in the *Daily Scotsman*, September 5th and 11th, October 11th, 1857, and *Asylum Journal*, April, 1858, p. 202.

† Refer to the *Report of the Eastern Lunatic Asylum, in the City of Williamsburg, Virginia*, 1858, pp. 56, 57. Richmond, printed by Bischeaud et Dunavant, 1857.

gentleman already mentioned, to introduce into its colonies the new system of improvements. We have thus stated in a few words founded on personal observation and experience, as well as based on historical information, that there can be no doubt respecting the affirmation of the first question. We are well acquainted with the trying and difficult position of the Directors of Asylums in Germany and elsewhere, regarding their administration and the experience attached to it in reference to the government, and the financial committees, and administrative government building surveyors. We can, however, only glance at this part of the question without entering on a special discussion of it, as it does not strictly belong to the subject; but we find in all these points a pressing reason for affirming the proposed question. On a more minute examination we are driven to the second portion of the same question—*i.e.*, “how to keep the incurable, and detain those lunatics who require it.” This phrase is for us a question involving a great principle. We ask, what curable or incurable lunatic requires detention? We reply, detention or seclusion can only have this double aim:—1st. To protect society at large and the patient himself from danger in general, and prevent self-destruction of every kind. 2nd. A therapeutic aim, by separation, discipline, &c. Where this aim is not obtained, or where it is not positively demanded, all detention of a lunatic is an *irrational barbarous abuse*. This is, alas! still followed from prejudice, power of habit, idle fear, routine, and sometimes also from baser motives. The consequences of which, openly pronounced, are these, that in the year 1861 no less than 125,000 lunatics, nearly half the entire lunatic population of Europe, are unjustly condemned to detention. It would lead us too far away to illustrate this fundamental question in detail here, we will endeavour to do this in a larger work, which, although we are constantly engaged in its composition, cannot be soon finished on account of the wide area it embraces.* We will, therefore, now leave the first question as settled, and enter on the second.

2. The meeting at Eisenach decided on rejecting this question. But we must be allowed to ask, is it justifiable, or even permissible, thus finally to reject an objective question in science of this kind, and close the discussion? Further, have we not a right to look upon such a rejection as an act which can carry with it no authority whatever? What would become of science if we were to dispose of important questions in this summary manner, and not admit dissent and discussion?

* We have been occupied for a lengthened period with the composition of a larger Phrenopeutic work, with the motto, “*Incedo per ignes.*”

Truly we should be driven to the *et tamen movetur* of the martyr Galileo. The two questions noted have only been twice publicly and verbally discussed in societies by alienist physicians, and these discussions are of very recent date. The Eisenach meeting discussed the question on the 12th September, 1860; and the Medico-Psychological Society of Paris discussed it during its meeting on the 26th June, 1860, on the motion of M. Briere de Boismont, and afterwards recurred to it in the following meeting on the 30th July, by desire of M. Moreau de Tours. At present we intentionally forego a critical examination of this discussion, and express only our gladness at the final result of the Paris meeting of the 30th of July, in which it was resolved, on the motion of the President, M. Trélat, seconded by M. Archambault, that Messrs. Michea, Moreau (de Tours), Mesnet, J. Falret, and Ferrus, should be requested to do that which was most palpably best, and what had been done by Esquirol and Voisin on the 21st August, 1821, namely, to proceed to Gheel, and to report their personal observations to the society. Let us hope that these gentlemen will not make so short a stay at Gheel as Esquirol and his distinguished disciple did; for forty hours' stay at Gheel would not now be a sufficient time in which to furnish a critical report on the institution; we who have been several months there may be permitted to have an opinion on the matter. Hitherto this colony for lunatics has only been criticized by gentlemen who have either not been there at all, or who have scarcely devoted twelve hours to its examination, out of which they have rested and refreshed themselves, and given but two hours to the "*Patronalem Asyle*" itself; and be it remembered that the colony contains nine French miles, is situated in fourteen districts, and has a town with 11,206 inhabitants, of whom 1000 are lunatics. We think it interesting and important to give the names of every visitor, both medical and philanthropical, who has visited Gheel during the last five years up to December, 1859; and this is after the period in which the reorganization of Gheel began.

From *Belgium*, Guislain, Ducpetiaux, Parigot, Theis, Perkins, Bull, Onez, Sauveur, Koepel.

Holland.—Schröder van der Kolk, Veith.

Russia.—Leifert, Konowishe, Babienski, Lorenz, Arneth.

Sweden.—Ohiström; and Dall, from *Norway*.

England.—Webster, Stevens, Francis, Galt, [? *America*].

Scotland.—Coxe, Mitchell, Sibbald.

France.—Labitte, Jules Duval.

Spain.—Pjados.

Poland.—Plaskowski.

Siebenburgen.—Kellermann.

Hanover.—Droste.

With the exception of Schröder van der Kolk, who remained two days in Gheel, and Dr. Droste from Osnabruck, who stayed there some days, at different periods, and who is untiring in his pleadings for the place,* none of these gentlemen devoted more than a few hours to its examination. Be it further observed that, until now, some countries of Europe, such as Switzerland, Italy, &c., have never sent any visitors to Gheel; and others, as France, England, Austria, and the whole of Germany, have only despatched a few. Previous to its reorganization, Gheel was still more scantily inspected, for, from the most minute inquiries, we have only been able to trace the following:—Simorurt and a few others from Belgium. Hume and Morrison; Sir Andrew Halliday, 1828; Dr. Cumming, 1852; Dr. Browne, 1838; Morell, 1844, from England. From France—Esquirol and Voisin, Moreau de Tours, 1842; Brierre de Boismont, 1846; Ferrus, 1849. We were also informed by Drs. Grünty, of Leipsic, and Lessing, from Sonnenstein, in Saxony, that they had visited Gheel years ago. Under Parigot, from 1849 to the beginning of 1856, there were scarcely any visitors at all at Gheel, except Dr. Droste and Dr. Biffi from Milan, and the philanthropists, Appert, from Hamburg, Podista, from Italy, and lastly, Dr. Begley, from England. We have thus, with careful research, scarcely been able to enumerate fifty persons who have visited this institution for a few hours, a colony that has been for centuries in existence, and which, in recent times, has, both theoretically and practically, progressed with modern science. But this institution, which had been so rarely visited and so superficially examined and judged, not only maintains itself, but flourishes, improves, and increases. In the words of Dr. Damerow,† Gheel must be looked upon as an historical and practical basis for every reform in the science and administration of lunacy, and as having produced wonderful results. It therefore stands to reason that the discussion, both verbally and in writing, of this most important institution, must not be closed, but that it must be renewed, energetically followed up, and thoroughly criticised by competent men. All that has hitherto been written on Gheel is referred to in the notes added to our article.‡

* Refer to the *Correspondenz Blatt für Psychiatrie*, August 31, 1856; further, *Allgemeine Zeitschrift für Psychiatrie*, 1853, vol. x. part ii.; further, *Medicinische Aehrenlese* (Rakhorstische Burhh, Osnabruck), October, 1856, and January, 1859 and 1860; lastly, September, November, and December, 1860, of the same *Aehrenlese*.

† *Allgemeine Zeitschrift für Psychiatrie*, 1855, p. 443; 1856, p. 147; 1857, p. 491; 1858, p. 412.

‡ Whatever has been written on Gheel has been of a cursory kind; the colony has never been systematically examined nor criticised. Most has been done by Professor J. Parigot, of Brussels. He published several articles on Gheel in the

3. The third question was entirely ignored by the meeting at Eisenach, which was in conformity with their affirmation of the second question. As we have disputed that opinion, we are obliged to consider this last question also. We need wait no longer for further proofs of the favourable results obtained by the care of lunatics at Gheel, as we already possess, from the observations of a number of years, sufficient evidence of it, and we can only regret that Dr. Flemming seems unaware of this. The official reports of the present chief physician of Gheel, Dr. Bulcken—and a more industrious, well-qualified, and highly-informed scientific physician it would be difficult to find—which he periodically furnishes to the Minister of Justice and the permanent Commission appointed for the superintendence of the Gheel institution, supply us with the following results. From the beginning of the year 1856 to the end of 1859, 527 lunatics were received at Gheel, of whom 96 were discharged recovered; thus an average of fifteen per cent. cures is obtained. These results would appear still more favourable if the trouble were taken to investigate the special cases of recovery. It must not be forgotten that it is a principle with the Belgian Government, never to send a case to Gheel which has not been pronounced incurable, and that the communal physicians must be particularly careful only to recommend such cases to be transferred there.

It is not our intention to discuss here the diagnosis arrived at, but it is known from the official registers of the patients, that during the last four years only 145 have been pronounced curable of the 527 accepted; so we may conclude that from 527 patients 145 being deducted as curable and 96 of these being cured, the per-centage of recoveries reached 66·0. The affections of the cured patients were—

Journal de Médecine de Brussels, in the years 1850 to 1860; further, the article mentioned in a previous note, and several pamphlets. In 1852 he wrote his book, *L'air libre et la vie de la Famille dans la Commune de Gheel*. Bruxelles, Ternier, 1852.

The *Official Reports on Lunatic Asylums*, by the Inspecteur-General of lunatics at Brussels, Ducpetiaux, and the few words of Esquirol and Guislain, contain, in addition to the references already given, nearly everything that has been published on Gheel and its system. The Official Reports of the chief physician, Dr. Bulcken, which are almost unknown, furnish in reality the most complete material. We recommend these reports for consultation and examination. They are published by Hayer, at Brussels. Jules Duval has published an appendix to his work already mentioned, under the title *Gheel une Colonie*, in which we find a complete bibliography on this subject. Observations on Gheel occur in several journals and books on Psychiatry, particularly in Griesinger's *Lehrbuch der Psychiatrie*, p. 396, and in the *Lancet*, July 18, 1857, August, 1860, 4th, 11th, and 28th. Moreau de Tours has published his views on Gheel in the *Annales Médico-Psychologiques*, 1842, so likewise Brierre de Boismont in the same Journal, 1852, and 1846, in a separate pamphlet. Both these gentlemen are again going to visit Gheel, and we are very anxious for their renewed opinions on it.

Mania	54	males, 45	females.	Total, 99
Hypochondriacal melancholy	16	„	19 „	„ 35
Progressing imbecility .	7	„	2 „	„ 9
	<u>77</u>		<u>68</u>	<u>145*</u>
Totals	77		68	

The ages of the cured averaged from twenty to fifty years.

The district of Brussels, which furnishes the greatest portion of the lunatic population of Gheel, affords a still more powerful proof of the value of the colony.

Of 135 lunatics received during the last four years, two-thirds were pronounced radically incurable, yet thirty-five of them have already been sent away cured, which makes a percentage of thirty-two cures per hundred. We repeat, we take these diagnoses as they come, and leave the separate cases to the respective responsibilities of the parties who formed them. Nor shall we repeat the constantly recurring inquiry how far we are to accept such statistical evidence, as we must of necessity take such facts for a basis of examination. We would, however, refer to the complete statistics furnished by the chief physician, Dr. Bulcken, in his reports, which are conscientiously compiled. We find the most minute changes of population, details of increase and decrease, cures, deaths, and other accidents reported to satisfy the present requirements of our science.

It would lead us too far to repeat and examine these specialities ; moreover, they may be found in the appendix of Jules Duval's book on Gheel. We think we have already proved all we wished to do—viz., as it is a chief condition that only those are sent to Gheel who have been pronounced *incurable*, and the good effects of the care at Gheel are proved by many cures, we must consequently admit that the system of Gheel furnishes the most favourable results for the cure of lunatics. Professor Parigot, the most indefatigable advocate and constantly-assailed champion of Gheel,† has, therefore, only lately maintained what has long been proved. We may now ask, for what information is Dr. Flemming waiting, when he has already been furnished with abundant facts and innumerable proofs ?

4. The reply to the first part (a) of this question has been so frequently given, that we shall not enter into its discussion ; but one observation we cannot forbear making, namely, that in the construction of new asylums it is often the chief physician who originates more expenses, by recommending costly adornments of

* [There is an error in Dr. Munday's figures, which we have not the means to correct.—ED.]

† Professor T. Parigot, of Brussels, has sacrificed his position, his time, fortune, and medical practice for the defence of Gheel and its system, and yet his professional brethren in phrenopathy hurl reproaches at him. Does it require a surer proof, that he defends a great cause with talent and truth ?

the building. As to the second part of this question (*b*), referring to the formation of colonies as adjuncts to lunatic asylums, we are both surprised and delighted that this proposition has been thought of sufficient importance for a further discussion at the next meeting. We are astonished, for this simple reason, that we cannot understand that those who can logically reject the second question, and completely ignore the third, can yet reserve for discussion the very principle which is involved in the two rejected questions. The natural consequence must be that the next meeting will take up these two questions, examine and sift them in all their bearings, and prove to the world the thorough inconsistency of the Eisenach resolution.

On the subject of Dr. Flemming's fourth question, we shall give only a few words of a general nature.

First; the creation of lunatic colonies, patronal or family asylums, on which the lunatic asylums should depend, is, (*a*) practical in execution; (*b*) urgently necessary; (*c*) financially and administratively necessary; (*d*) therapeutically effective; and (*e*) they suffice for every desire for the protection and furtherance of order in society and sanitary police, and are satisfactory to the demands of humanity as well as those of modern science.

a. The best proof of the practical execution of the plan is found in the institution of Gheel, which has been established for centuries; and in spite of the various vicissitudes it has suffered, it has in recent times progressed more and more in science, so as to keep up to the demands of the age, and must be looked upon as the basis for the pressing reorganization of the healing art for lunatics.

b. As it cannot be denied that the entire sequestration of all lunatics which is still persevered in, is not only contrary to all the therapeutical laws of science, but also entirely opposed to every personal and social right, it stands to reason that the urgently recommended re-organization, which has been proved to be quite possible, is urgently necessary, and this urgency is strengthened by the reply to the first question.

c. It is well known what enormous sums the present palace-like buildings cost States in their construction and administration, and how, after a few years, they prove utterly inadequate to the necessities of the time, and require new sacrifices. We suppose therefore that, First, a large estate is bought, containing every requisite which a topographic, telluric, and social regard require for a good lunatic institution—in other words, the right situation, climate, air, light, water, land, and people for such an undertaking. Secondly; that in the centre of the estate a central asylum is built, which shall be in every respect complete and separated in two divisions. The first division for new and acute cases, the

second for chronic cases. The latter would be sequestered according to necessity, not only to prevent danger, and for personal protection, but also for therapeutic purposes and diagnostic examinations. Thirdly; that various cottages should be built on the estate, if there are not enough already present, which should contain the necessary requirements. Fourthly; in these cottages or homes those patients, either in the acute or chronic phases, who do not need sequestration, should be tended and protected; they should be properly fed, nursed, and treated by the inmates of these homes, if they are fit for the office, or if not, properly qualified persons and their families should be placed in them. Fifthly; to every one of these cottages and their inmates land, pasture, cattle, &c., must be given, of which they must take care, and for which they must pay rent to the estate. The steward, on the other hand, would receive pecuniary compensation for his patients, according to the plan or mode of division laid down. Sixthly; no house should contain, at the utmost, more than four patients. The separation of sexes is often necessary, but not indiscriminately so. Gheel furnishes proofs of this. Seventhly; the State must be purchaser and proprietor of the estate, but the temporal lord of the manor and principal manager of the estate would be the chief physician. Every officer of the administration and of the farm should be his subordinate, and every steward and farmer dependent on him alone. Eighthly; the number of the assistant physicians would depend on the size of the estate and lunatic population. At all events, the number should be much increased, and they should remain much longer in the asylums than they do at present. Ninthly; there should be a perfect code of laws for the guidance of the administration, the assistant-physicians, nurses, stewards, &c. Tenthly; various modifications of the laws will be necessary according to the land, population, and other exceptional circumstances. We now put the question, Would not the purchase of such an estate be financially and administratively advantageous to the State, considering the income it would derive from the patients, the farms, &c.? Our proposition would further have this advantage over the present system, that such an estate would, if properly managed, be a perpetual patronal lunatic asylum for many States, serviceable for ever, whilst now four or five costly establishments barely satisfy the demands on them. Larger countries would of course be obliged to establish several such estates in convenient positions. The first purchase capital would of course be greater than is at present necessary for the formation of a lunatic asylum, but it must not be forgotten that the capital for the latter is lost, while the sums for the estates not only pay a good interest, but are eventually paid up. We think that we have now proved, in outline,

that this project is financially cheap, and administratively practical. Do not ask where such an estate is to be found, and where the tenants, directors, administrators, &c.? Those who thus ask prove at once their inefficiency and incapacity. It would be another matter to ask where are the promoters and protectors of such a scheme. These certainly would only be found in wise and enlightened kings and their advisers, and therefore necessarily all individual speculations and corrupt private asylums would receive their death-blow.

d. Therapeutical practice here distinguishes two principal and fundamental rules:—

1. *Sana cito et jucunde.*

2. *Procura incurabilibus summum boni et animi quod licet et prosit.*

This project includes both objects. Shall we draw a comparison between the situation and arrangements of the best-conducted private asylums, and those of the unjustly accused and calumniated Gheel? And yet we do not look upon Gheel either in a topographic or administrative sense as a model for our new institution; it should simply be an instructive example, whose good we would imitate, and whose defects we would avoid.* That patients are easily and quickly cured at Gheel, we have sufficiently proved in the third question. What results, then, might we not expect in cures, were all unfavourable influences removed, and we were furnished with means still further to effect cures?

e. The proofs furnished under *a*, *b*, *c*, *d* render it unnecessary to enter more minutely into this last point, as it is already settled by these arguments. Order, peace, and sanitary police are nowhere in greater efficiency than at Gheel. In a whole century there has not been one act of violence, and this in a place where there are 600 lunatics, which number is often increased to a population of 1000, who move freely in families, surrounded by women and children, who mix with strangers and inhabitants, work, amuse, and occupy themselves in the fields, woods, and meadows, and on the river. No suicides have happened here for years; no injuries, no wanton destruction of property, no incendiaries, and in the last ten years there have been scarcely any cases of rape. Here lunatics nurse children and are nursed by them, escapes or ill-usage from lunatics are matters of the greatest rarity. Shall we still ask whether humanity suffers under such management, or whether it derives benefit from it? Or shall such principles and their fruits remain solitary in the world, with no attempt to repeat

* We do not suffer from "Gheelnomania," as some one took upon himself, in a remarkable manner, to observe, and who subsequently acknowledged all at once the truth of our observations. Gheel is no model for us, but an instructive example.

or improve them? The theory of science absolutely demands practical reforms; the greatest authorities of our time, adversaries as well as advocates, unite in the demand for reforms. It is time, therefore, that we should throw off the stagnation under which we have laboured since the reforms of Pinel; it is time that we should no longer suffer humanity and the true laws of nature and science to be trodden under foot; we must no longer permit the caricatures which routine and custom have foisted upon us—disgraceful pictures which disgust us by their egotism, their fear, and their eagerness for gain. These are our views of the question stated in a few words. We have been requested by several parties to write them down, and we have endeavoured to do so freely and openly. After the publication of our systematic work, we shall wait for the scientific criticism of its practical value to improve and elucidate our views as may be necessary; we shall never, however, cease to expose incompetent criticism. We have one final wish, which is, that the scheme we have so untiringly advocated theoretically shall be practically carried out, for words without deeds are of no avail.

POSTSCRIPT.

This article was written for the April number of the *Psychological Journal*, but forwarded at too late a period for insertion. Since its preparation a good deal of agitation has occurred respecting Gheel. Thus—

1st. Dr. Browne wrote an article adverse to Gheel in this *Journal* (April, 1861) p. 213 to 237.

2nd. Dr. Sibbald published an article in favour of Gheel in Dr. Bucknill's *Journal of Mental Science*, April part, 1861, p. 31 to 61.

3rd. Dr. Bulcken, chief physician at Gheel, has published his second official report on this patronal asylum.

4th. Dr. Parigot has protested in an article of the *Medical Journal of Brussels*, against the words used by the Medico-Psychological Society of Paris against Gheel.

5th. Dr. Bulcken also protested against these observations in a letter published in the April part of the *Annales Medico-Psychologiques*.

6th. Dr. Ferrus, of Paris, a celebrated and meritorious physician, who was the instigator of these protests, has since died.

7th. Moreau de Tours, Paris, wrote a critical article on Dr. Morel's new book, the *Non-Restraint*, in *L'Union Medicale*, February part, No. 25 and 26, and adds some very characteristic observations on Gheel.

8th. At a meeting held at London, on 19th April, 1861, for the erection of a "Benevolent Asylum for the Insane of the Middle Classes," Mr. Stephen Cave, M.P., spoke in favour of Gheel.

9th. The Gheel question was also mentioned by physicians, in a preliminary meeting of the society which will assemble at Speyer this summer.

10th. The director of the Lunatic Colony, Fitz James, in France, near Clermont (Oise), Dr. Gustave Labitte, has published a most remarkable pamphlet on this colony.

11th. The commissioners for the purpose of erecting new lunatic asylums for the Department of the Seine, which is Paris, have in effect decided for decentralization and for colonization. Dr. Girard de Cailleun is the medical referee of this commission.

ART. VII.—THREE THOUSAND A YEAR:—A SOLILOQUY.

—— CERTAINLY I am “doing” about 3000*l.* a year. I think there can be no mistake about it. What makes me think so is, that for the last week or so I have been putting on my books at least 9*l.* a day. This is as good as I had any right to calculate upon. It was very prudent on my part in fixing on a house in this conspicuous situation. It is a duty to make oneself known, and to place oneself within easy access of the world. The best men have done so as a matter of course—such as Sir Astley Cooper, or Sir Henry Hallford. My friend Eusebius and his partner, together, at the other end of London, do at least 7000*l.* a year. Let me see.—They have four carriages, seven horses, two grooms, and three assistants. As early as seven in the morning they start to see their out-of-town patients. Then they return in time for their home customers—I mean patients—about eleven or twelve o’clock, noon. Next, they lunch, and after that drive round to see their town patients. I know Eusebius declares that their run of business is often more like 9000*l.* than 7000*l.* a year; but we will make some allowances for a very pardonable exaggeration in this respect. It is so easy to deceive oneself, without meaning to do so, in the full tide of reputation and success. I know that Eusebius is called to the greatest distances. He refused a visit to Worcester the other day, and a second to Ramsgate, because he thought the fees too small. Well, I do not venture to suppose I shall rival him in prosperity. But certainly, things look very well just now, and I am on the fair way to make 3000*l.* a year, if I am not making it already. I am attending Lady ——’s lady’s-maid, and one of the daughters. They are worth looking after, for their connexions are extensive, and I have already

gained some introductions through their good word. Then, there is the rich banker in —— lane, and all his family. It is worth something to be known as in attendance on a house of that description. They pay well; and, in fact, are so rich that they have only to ring the bell and ask for whatever they want. A powdered footman, with a sweet-smelling note, calls for me almost every day. I have also Lord This upon my list, and his lordship has just introduced me to his stockbroker, so well known in the money market. I have no doubt I shall attend the Governor of the Bank of England next. This would be a grand catch. I gained great credit from the dexterity with which I rescued the Honourable Mrs. X. Y. Z.'s daughter from the imminent danger she was in through the neglect or mismanagement of her learned and distinguished medical adviser. The President of the Royal College of Physicians will never forgive my success in that quarter. As for the Honourable Mrs. X. herself, she was so fully convinced of my merit, that she actually made me a present of my own bust in marble, the size of life, from the studio of Chantrey, and insisted on my placing it in a visible part of my entrance-hall. She likewise requested the erudite Mr. Simon Chatterly to compose a Latin inscription to be inscribed in letters of gold around the base. The Greek Professor of ——, whom I am now attending, says it is the finest piece of Latinity he ever read. He has just done me the honour of requesting me to favour him with one of my photograph likenesses, which he will take the earliest opportunity of placing before a very distinguished personage, accompanied with an encomium on my professional talents. That was a capital turn of fortune in my favour—I mean my being called to that case beyond Oxford—a very good patient, and well worth looking after. It was a severe case, and it turned out well. The old fellow, I find, is a distant relation of the Marquis of Carabas, whose son is the M.P. for the county, and has his town residence close by mine in London. I must try and get in there—a good connexion. My neighbour, Tom Blank, attends the family. A good enough sort of man, but rather easy and antiquated—a by-gone. I must keep a sharp look-out, and seize the first opportunity of getting my foot in the doorway. And, then, that fellow Wayse,—why, Dr. Wayse, when he was here, did nothing—absolutely nothing. Now, since he has turned homœopath he does 1000*l.* a year, and without the smallest trouble. “Why, Wayse,” I said to him the other day, when we met at the Eastern Counties’ station, —“Why, Wayse, they tell me you are making your fortune—is that the case? Wish you joy of it, my good fellow, with all my heart.” “O yes,” says Wayse, “it is quite true.” “And you are also a homœopath,” I continued; “and is that true

also?" "No, not exactly a homœopath," returns Wayse. "Not?—What are you then?" "An eclectic," says Wayse, rather demurely. "An eclectic. What is that?" "Why," says Wayse, "I mean I am an eclectic in the real meaning of the word, for I choose what is best out of everything, whether homœopathy or allopathy. My object is the good of my patient." "Capital! I understand: very sensible, and exactly to the point." After parting, I remembered that Wayse had lately published a pamphlet, in which, among other things, he maintains that a few drops of laudanum in a tumbler of water is an infallible cure for apoplexy. A *few* drops did I say? It was a single drop, if not less than that. How very curious! I wonder if Dr. Wayse believes what he says? Let me see! Apoplexy—what is the cause of apoplexy? The causes are numerous. First of all, simple congestion. Perhaps he means that, because he states, that as a full dose of laudanum produces apoplectic congestion, so an infinitesimal dose of the same drug will cure it. I know he said so; I heard him say it; and I have read his words to this effect in print. Well, this is certainly something quite new. Then, the next cause is, What? Let us say an atheromatous condition of the arteries. Will a few drops of landanum cure this? Atheromatous arteries—I do not quite like that word—it is not simple enough. The other day, when I was in consultation with Dr. F., I said I thought the arteries in our patient's head were atheromatous. "What do you mean by atheromatous?" asked Dr. F., his eyes twinkling, and glancing at me rather slyly I fancied. "Atheromatous—" I said, meaning to explain myself, but my memory was so treacherous at the moment, that I could not recollect the primitive derivation of the word, although I remembered it was Greek. Just as I turned to explain my meaning, I caught Dr. F.'s eye steadily examining my carriage and pair, drawn up alongside of his, as we were both looking out of the dining-room window into the street. "What do you think of my two greys, Dr. F.?" I inquired, breaking in upon his apparent abstraction; "they are capital carriage horses, and I gave 60*l.* a piece for them—they do their work excellently." "60*l.* a piece!—you must be a rich man," said Dr. F., politely taking leave of me, and smiling as he turned away. A distinguished man that Dr. F., thought I to myself, and evidently accustomed to high people. I must do my best to make up to him; it's worth my while to stand well in his good graces. Bother that word *atheromatous*; why did I use it? I ought to have said *degeneration*, which would have done just as well, and sounded quite as pathological. I do not like pointed questions—they argue a malevolent disposition. Why, the other day, as I was talking to that old-fashioned fellow H., in the street, and telling him of my

doing 3000*l.* a year, he said bluntly in return, "Then you pay income-tax on 3000*l.*" "No, not exactly so," I replied. "How so?" retorted H.; "how do you manage to get off?" "Why," I replied, "if you must know, I have not made up my books yet, so I cannot precisely say so." "Then, in fact," continued H., in the coolest tone possible, "you do not know for certain that you are making 3000*l.* a year, but only imagine it." Nothing could have been in worse taste. I wished him good bye as quickly as possible. But this is not all. One day I told him I had a case of fever under my care of great severity, arising from poisoned blood. "Poisoned blood," he said eagerly; "how do you know it was poisoned blood?" He is the most provoking creature in the world; merely a reading man, who knows nothing of practice. For my part, I never read. I am a practical man. I read nature at the bedside. Of course it was poisoned blood—no one could doubt it, and I said so to him. "Yes," he replied, "you have no doubt of it, I see. But, now, tell me. If you had two cups of blood, freshly drawn, before you, one from a healthy person, and the other from a blood-poisoned patient, could you tell me the difference simply by looking at them, or have you any chemical or microscopical proof, by which you can distinguish the one from the other—the poisoned from the healthy blood? If so, pray tell me, for I am desirous of collecting all the information I can on this topic." Now, was there ever anything half so tiresome as this fellow? But this is the way with these reading men, they are always for pushing their inquiries to the utmost, and are content with nothing but absolute proof and certainty. Just as if I could tell him anything of the sort, or had time to make such minute inquiries. No, not I; I have something better to look after. So I cut the matter short by wishing him good day, stepped into my carriage, and drove off. There is no escaping, however, from folks of this kind. Not long after, I met him again, just after that distressing case of suicide, which made so much noise at the time, and in which I was summoned to appear as the medical witness at the inquest. "Why," exclaimed H., "what a remarkable case that was—the man spoke after his throat was cut! I should never have given credit to anything so remarkable, except upon your testimony; and I have entered it in my note book, under your name thus: A man cut his throat through the bronchial tubes, and yet kept crying out, 'Oh! doctor, save me,' and lived three weeks afterwards. I think it so very remarkable, that I shall keep it by me to publish on some future occasion, upon the authority of your good name. And it is the more remarkable," he continued, for it was impossible to stop him, "because the cut went through, not the larynx, which is above the sternum, but through the two bronchi, or

bronchial tubes, which are below and behind the sternum, and the cut missed wounding the chief arteries which lie in front of, or contiguous to, the bronchi, and must in ordinary cases have been first cut through before the bronchi could be reached. Most remarkable ! I have made a note of it, and will publish it whenever I am required to place upon record *The Curiosities of Surgery*.* This was too bad. I saw I could no longer keep terms with him. So I took the advice of my patient and friend, Major Longbeard, and resolved to disembarass myself of a troublesome acquaintance of this kind at the first convenient opportunity. I had not long to wait. One day, as I was driving up to a patient's door in my open carriage, H., who was passing by at the time, stepped forward with alacrity to help me to alight. I touched his hand with the tips of my fingers, treated him with the disdain he deserved, and cut him dead on the spot.

ART. VIII.—THE STATE OF LUNACY IN SCOTLAND.

THE third Annual Report of the Commissioners in Lunacy for Scotland, on the condition and management of Lunatics and Lunatic Asylums in that kingdom, now lies before us. From it we learn that in 1859, as in 1858, there was a "considerable increase" in the amount of pauper lunatics. Thus on the 1st of January, 1858, the number returned amounted to 4737, on the 1st of January, 1859, to 4980, and on the 1st of January, 1860, to 5226, showing an increase of 243 in 1858, and of 246 in 1859.

The following table sets forth the number of known insane in Scotland on the 1st of January, 1860, and the mode in which they were domiciled. It is important to note that the number of lunatics in private houses is only approximately estimated :—

* *Extract from the printed report of the Inquest* (Daily papers.) "By the foreman : I never once saw a symptom of insanity in him. Another juror : If you say his mind was not at all impaired, how do you account for this act ? Witness : Temporary insanity. You and I are liable to temporary insanity. I once was called in to attend a man who had cut his throat ; but he had only cut through the bronchial tubes, and had not divided the carotid arteries ; and he kept crying out, 'Oh ! doctor, save me, save me.' I attended to him, and then had him removed to a neighbouring hospital, and he lived for three weeks." The jury were perfectly satisfied with the evidence, and what was still more surprising, so was the coroner.

	Male.	Female.	Total.	Private.			Pauper.		
				Male.	Female.	Total.	Male.	Female.	Total.
In Public Asylums...	1355	1277	2632	402	371	773	953	906	1859
„ Private „	349	503	852	84	112	196	265	391	656
„ Poorhouses.....	349	517	866	...	2	2	349	515	864
„ Private Houses ..	1869	1865	3734	1041	846	1887	828	1019	1847
Total.....	3922	4162	8084	1527	1331	2858	2395	2831	5226

From this table it would appear that of 8084 lunatics in Scotland, 2858 are supported by private funds, and 5226 by parochial rates. From a comparison of these numbers with those of the preceding year, it is ascertained that the increase in the number of the insane is restricted to pauper lunatics. Thus the corresponding numbers on the 1st of January, 1859, were 2898 and 4980. On the other hand the number of private patients had diminished. "This result," the Commissioners remark, "is probably in great measure due to the transfer of a number of the indigent insane from the class of private patients to that of paupers."

The difficulty of determining what constitutes a lunatic in the eye of the law, complained of by the Commissioners in previous Reports, still impedes their efforts in carrying the law into effect. They are authorized, for example, to "permit a parochial board to dispense with the removal of any pauper lunatic to an asylum, and to provide for him in such other manner, and under such regulations, as to inspection or otherwise, as they may sanction." They have, therefore, granted permission to upwards of 2000 cases to remain under private care, dispensing with their removal to asylums. But the statute defines a lunatic to be, "any mad or furious or fatuous person, or person so diseased or affected in mind as to render him unfit, in the opinion of competent medical persons, to be at large, either as regards his own personal safety, or the safety of the persons and property of others, or of the public." This definition renders it doubtful whether insane paupers, exempted from removal to an asylum, are to be reckoned as lunatics. Consequently it is doubtful, also, whether the Board of Supervision for the Relief of the Poor or the Board of Lunacy are responsible for the proper care and treatment of lunatic paupers not in asylums. The Board of Lunacy have hitherto acted on the belief that the responsibility lay with them, but the Commissioners observe, "practical difficulties are constantly occurring, which make it extremely desirable that the

statute should explicitly declare that insane paupers, exempted from removal, belong to the category of pauper lunatics. All dubiety on this point would at once be removed, by making the definition of lunacy include any person certified by two competent medical men to be 'a lunatic, an insane person, an idiot, or a person of unsound mind.'"

One of the most effective means at the command of the Commissioners for improving the condition of pauper lunatics, is to require their removal to an asylum if they are not satisfactorily cared for by the parochial authorities. But the Commissioners complain that "their efforts in this direction are occasionally defeated by the decision of the Sheriff, that the patient, though undoubtedly of unsound mind, is not a lunatic in the statutory sense, from the medical certificates containing no statement of facts showing him to be dangerous either to himself or others." Thus it happens from time to time that cases unfit to be at large on other grounds, and who are utterly neglected by those who have the care of them, cannot be properly dealt with on account of the Sheriff's decision. There is, moreover, a total want of uniformity in the practice of different Sheriffs in confirming the order for the admission of a lunatic to an asylum. While, on the one hand, some adhere strictly to the letter of the law, others ratify the medical certificate as a mere form. Evils arise out of both practices, for if by the one lunatics who, if justly treated, should be confined in an asylum, are kept out, by the other persons said to be lunatics are at times admitted on very insufficient evidence. But the Commissioners reiterate an opinion expressed in former Reports, that—

"Less evil is likely to result from the Sheriff's accepting, as proof of insanity, the simple certificates to this effect of two qualified men, than from his refusing to receive them, unless facts plainly proving the existence of insanity are, at the same time, stated. A medical man, we remarked, may, from the manner, appearance, and conduct of a patient, be thoroughly convinced of his insanity, and may nevertheless fail, by any statement of facts, to convey the same conviction to another person; and this difficulty will be greatest in the incipient stages of the malady. No careful observer can have failed to notice that almost all the murders and suicides committed by lunatics take place at the outset of the malady, before the symptoms are sufficiently developed to enable medical men to grant certificates in such form as would satisfy the Sheriff."

Thus, of two cases cited, the Sheriff's order was granted in one on certificates containing scarcely any evidence of insanity, while it was refused in the following instance, in which the facts stated in the certificates were, to say the least, equally strong. In this case it was stated that the patient had "an excited, rest-

less expression, is very talkative, and complains of weariness of life," and that "her manner and conversation indicate the weak mind of old age." She was reported, also, on the statement of others, to be sleepless, affected with delusions, garrulous, querulous, advanced in years, frail in mind and weak in body, and requiring constant care and supervision. The order for admission to an asylum was refused, and the patient was in consequence placed in the ordinary wards of a workhouse. "The result was, that she rose from her bed during the first night, threw open the window, flung herself out, and was killed on the spot."

"Experience," the Commissioners state, "has convinced us that it will be impossible to introduce a uniform procedure as regards orders so long as the Sheriff seeks, in his judicial capacity, to determine whether the medical certificates afford sufficient evidence of the existence of insanity. We would therefore suggest that the Sheriff should, as a matter of course, grant his order for the admission of patients on the simple certificates of two qualified medical men, that the patient is insane and a proper person to be detained in an asylum; and that it should be the duty of the Commissioners to examine the certificates, and to call for their amendment when defective; or to require the discharge of the patient when the evidence of insanity appeared imperfect and could not be substantiated. It must frequently happen that stringent statutory directions as to the disposal of lunatics cannot be adhered to without great risk of accidents, and we are therefore of opinion, that it is not advisable to administer the law of lunacy as stringently, or with as little latitude, as if it formed part of the criminal code. Accordingly, we consider that, in the following case, the Sheriff acted rightly in granting his order for the reception of the patient into an asylum, although no facts indicating insanity are stated in the certificates, as having been observed by the medical men themselves. All the evidence of its existence rests on the statements of the patient himself. The first medical man merely certifies that the patient 'complains of his head, and says that he must be punished, and that he has frequently thought of destroying himself;' while the second says, that 'in conversation he has told me that he is frequently seized with an impulse to jump into a well and drown himself, and that he has been subject to this feeling since Christmas last, and long before.' Here the whole evidence of insanity, so far as the facts observed by the granters of the certificates are concerned, rests on the declaration of the patient that he felt an impulse to suicide. This may or may not have been the case, but there is no doubt that a Sheriff by refusing his order on such certificates would have incurred a very serious responsibility. At the same time, however, it is not impossible that the patient may have feigned a tendency to suicide, for the purpose of being declared insane, with some ulterior object in view. Three instances have occurred since the institution of the Board, in which it was alleged that insanity was feigned for the purpose of evading legal responsibility; and reasons of considerable weight were brought forward in support of this belief. It is confess-

edly occasionally a matter of extreme difficulty to determine whether insanity is real or feigned; and this is especially the case where the mental affection is described as a liability to morbid impulse."

Other difficulties also arise from the necessity of the Sheriff's authority being required before a lunatic can be admitted into an asylum, and in concluding the first portion of their Report, the Commissioners say:—

"We have been induced to dwell thus fully on the difficulties which complicate the working of the present statute, with the view of showing the inexpediency of requiring a too rigid adherence to fixed forms in disposing of the insane. It appears to us that a Public Board might safely be entrusted with the power to modify the schedules necessary for the purpose, provided that no effect should be given to such modification until it was approved of by the Home Secretary.

"In Scotland, the general procedure in regard to lunatics approaches much too closely to that of the criminal law, and the necessity of obtaining the Sheriff's order for placing a patient in an asylum, frequently exercises a powerful influence in deterring friends from having recourse to this measure. Many persons, too, who would voluntarily place themselves under treatment are prevented taking this course by their unwillingness to submit to the present forms."

The question of the true value of the Sheriff's interposition before a lunatic can be placed under care in an asylum, is one of great importance at the present moment to England as well as Scotland, for it has been proposed to introduce a somewhat similar method of procedure in this country. We shall not hesitate, therefore, to detail certain opinions upon the subject recently expressed by Dr. Christison.* He conceives that the objections made to the Sheriff's interference, to wit, that it is (1) an obstacle which occasions injurious delay in some urgent cases of insanity; (2) that it keeps up, through the interposition of a law officer—who happens, among other functions, to have to discharge those of a criminal judge—that unfortunate prejudice in society which is too apt to regard an asylum as a prison rather than an hospital; and (3) that it carries with it no advantage that will outweigh these drawbacks,—these objections, he conceives, will not bear scrutiny.

"Admitting," he writes, "that injurious delay does really now happen so often as to require being prevented in future, there is a plain and easy remedy in extending to a period of three days the shorter term, for which at present, by virtue of a special certificate of urgency, a lunatic may, before the Sheriff's decision, be confined on certification of his insanity by two medical practitioners. The mistake that the public is prone to commit, of confounding a lunatic asylum with a

* See the introduction to his pamphlet *On some of the Medico-Legal Relations of the Habit of Intemperance*. Edinburgh, 1861.

prison, has no necessary connexion that I can see with the fact that a legal official of the Crown must authorize admission, but depends simply on the more general facts that admission is compulsory on the subject of it; and the mistake will, therefore, be equally apt to recur, whether the final authority for admission be given by a sheriff's warrant, a lunacy commissioner's sanction, or a physician's bare certificate. The third objection, that the sheriff's part in the form of admission into an asylum serves no useful purpose, has been founded, I fear, on a hasty view of the question, and deserves fuller consideration.

"No one conversant with the history of asylum law and practice in this country can fail to have observed how much more satisfied and sound the tone of the public mind is in Scotland than in England on the subject of restraint on account of insanity. In England there has been for some time a timorous dread of iniquitous confinement; it is no uncommon event for actions at law, charging unjustifiable and malicious confinement, to prove successful; and the morbid feeling of the country has plainly led juries to take sometimes a prejudiced and unfair view against the defenders on such occasions. In Scotland there is no fear, on the part of the public, that sane persons can be confined as insane; but, on the contrary, great confidence that impartial justice is rendered to all. Actions for erroneous confinement are rare, founded on frivolous pretences, and sometimes in themselves no small confirmation of insanity. Accordingly, no such prosecution, so far as I am aware, has hitherto found a jury on its side in any trial in Scotland."

Hence, Dr. Christison argues, the interposition of a legal functionary of high standing between the medical certificate and the asylum, is a protection both to the profession and the public, and each has an important interest in maintaining the integrity of the procedure.

Dr. Christison's opinions upon this question carry unusual weight, and we shall content ourselves with quoting them without comment. The points at issue are chiefly matters of fact, the true significance of which must be determined by observation bearing directly upon the doubts raised by Dr. Christison. For the solution of these doubts we shall look forward with confidence to the subsequent reports of the Commissioners in Lunacy.*

* We have just received the report of a most important meeting of the medical profession of Scotland, held in Edinburgh on the 7th of June, for the purpose of memorializing the Lord-Advocate as to certain modifications and amendments of the Scotch Lunacy Act. The proceedings of this meeting were of unusual interest, particularly in reference to the treatment of excessive intemperance and the Sheriff's jurisdiction in cases of insanity, and they will be found *in extenso* at the close of the present number of this Journal. The following resolution, confirmatory of the opinions entertained by the Scotch Commissioners in Lunacy, and in opposition to those of Dr. Christison, upon the intervention of the Sheriff, was adopted by a large majority:—

"That the existing form of the Sheriff's jurisdiction in cases of insanity is objectionable, as tending to delay and obstruction in the admission of cases of urgency into asylums, and also as interfering with the physician's province, which is to judge of the circumstances under which treatment in asylums is required; and that the security of the public requires only that the competency and good faith of the

The space at our disposal forbids us following in detail the rest of the Commissioners' Report. A few jottings taken here and there must suffice.

Notwithstanding the uncertainty in which the question of further legislation still remains, several of the District Lunacy Boards are taking active steps for building asylums. The returns of expenditure for pauper lunatics in 1859 support the conclusion derived by the Commissioners from those of 1858, that "it was for the interests of the ratepayers, as well as for the welfare of the patients, to restrict, as much as possible, the use of poorhouses for the cure and treatment of insane patients." The Statistical Section of the Report is of considerable interest, and promises well for the subsequent great value of the Scotch Statistics of Lunacy. Commenting upon the accumulation of chronic cases in asylums, the Commissioners remark:—

"The detention of the insane in these establishments should be a matter of thoughtful consideration in each individual case, and the question which the superintendent should seek to determine is, not whether the insanity of a patient is such as to warrant his continued detention, but whether it is such as to render his discharge impossible or impolitic. We are strongly impressed with the conviction that it is highly desirable to bring the propriety of detaining patients in asylums periodically under review; and we are therefore of opinion that the authority for their detention should be periodically renewed. The law of Holland authorizes the detention of a patient at first only for a period not exceeding three months, and afterwards from year to year, on satisfactory evidence that adequate reasons exist, beyond mere unsoundness of mind, for warranting prolonged detention."—(p. xxxi.)

The following observation is also worthy of note:—"We have had occasion to note a large number of cases of religious melancholia and excitement during the past year, which was generally ascribed to the influence of revivalism; but to what extent this cause has been productive of insanity, or has merely modified its symptoms, we are without the means to determine."

The influence exercised by the Commissioners in ameliorating the condition of single patients is illustrated by several most interesting cases. We read of one single patient chained to his bed for upwards of thirty years; of another sleeping habitually in the same compartment with a pig; of a third kept in a cage for several years, in a small back room of a shop, in a state of absolute nudity. These cases, with others, were saved from further horrible maltreatment and neglect by the interference of the

medical men signing the certificate should be placed beyond suspicion; and that the Lord-Advocate be requested to take these circumstances into his consideration, with a view either to the amendment of the Sheriff's jurisdiction, or to its being replaced by some other provision for accomplishing the object in view."

Board. The condition of individual asylums is, as usual, illustrated by extracts from the reports of the Visiting Commissioners. It is painful to record that the public have failed to take any warm interest in the endeavours made last year for the purpose of establishing a national institution in Scotland for the training and education of idiots. The Commissioners estimate that there are 2236 idiots and imbeciles in Scotland, of whom about 270 are ascertained to be below 15 years of age. The condition of the insane in poor-houses is passed carefully under review, and with results highly unfavourable to the continued reception of lunatics into them.

The Report terminates with an Appendix, chiefly containing many valuable statistical tables, and the General Reports on the Condition of Single Patients made by the Visiting Commissioners during the year 1860. These Reports are of extraordinary interest, and afford an insight perhaps not otherwise attainable into the social habits and condition of several of the least known districts of Scotland. As contributions also to our knowledge of the influence exercised by insanity within the spheres of domestic and social life, it would be difficult to exaggerate their value. Of the different reports, perhaps the English reader will be most interested with Dr. Browne's on Argyll, and Dr. Mitchell's on Lewis. We regret we cannot transfer these graphic papers bodily to our pages, as well as much of the other and equally valuable reports. We must content ourselves with a quotation from Dr. Mitchell's report, illustrative of the calamitous consequences of insanity in social life.

"The force of the calamity," he writes, "in all its aspects and ramifications which insanity inflicts on society, can never be better seen than during the visitation of single patients. On this and on other points, a single parish is sometimes marvellously instructive. Take C., for instance, in which there were found six pauper lunatics living singly.

"The first I saw was a poor woman labouring under melancholia, passing into fatuity. For seventeen of the eighteen years of her insanity, she has been kept lying on a shake-down in a dark corner of a gloomy room, never seeing a brighter object than a dingy wall. There she has lain till permanent flexure of her legs has resulted, with complete inability to walk. I found her a pale emaciated sufferer, weeping and moaning for the loss of her daughter, who had been for many years her nurse, and who had very recently died of consumption, exhibiting also symptoms of melancholia before her death. There is reason to believe, that the early judicious treatment of this case would have led to recovery. As it is, nothing remained but to take from her life as much of its misery as possible; and steps were immediately adopted to brighten the atmosphere in which she lives, and to surround her with the conditions of health.

"My next visit was to a poor orphan idiot, to whom had fallen the worst of all heritages. He was one of three idiots, the children of a father who died insane, and of whose relatives several were idiots.

"The third patient was an idiot woman, who, before she was fifteen years of age, bore an illegitimate child, also an idiot, but now dead.

"I next saw a young lad of 24, a complete idiot, the bastard child of an idiot mother, not now alive. From the day of his birth he has been a pauper, and he will continue to be so till that of his death.

"My fifth visit was paid to a loathsome, slaving idiot, who, twelve years ago, bore an illegitimate child, still alive and sane.

"It has often occurred to me that distressing cases of this nature can only be made to cease by making the administrators of the criminal law bound to investigate them, and by placing in their hands the power of punishment.

"The last of the six was a helpless, speechless idiot, the child of parents who were full cousins.

"Or take another parish, K., where there are also six pauper lunatics. Three of these labour under melancholia, and of all these a 'love disappointment is the assigned cause. One has a brother and sister insane, one has a father and uncle insane, and another a nephew. One, a deformed idiot, is the child of full cousins, and she has an idiot sister, a lame sister, and a paralytic brother. Another is the child of second cousins. While another has borne three illegitimate children. (p. 252).

It would be well if we could have somewhat similar reports to these from several English districts.

ART. IX.—THE ROAD MURDER PSYCHOLOGICALLY CONSIDERED.

"The seventeenth and eighteenth centuries, together with so much of the nineteenth as we have yet seen, jointly compose the Augustan age of murder."—*De Quincey*.

MURDER is a subject which exercises a terrible fascination over us. Blink the question as we may, we are conscious of an overweening interest in all that relates to the horrible act, even in its most common-place guise, whenever brought fairly home to the attention. Doubtless, under ordinary circumstances, while we munch our toast and sip our coffee, glancing meanwhile over the columns of the morning paper, the eye rests heedlessly upon the commoner examples of murderous brutality it too often finds there, and the attention is fully aroused only when arrested by the diabolical workmanship of a Youngman or a Mullins. But

* *The Great Crime of 1860*: being a Summary of the Facts relating to the Murder committed at Road; a Critical Review of its Social and Scientific Aspects; and an authorized account of the Family; with an Appendix containing the Evidence taken at the various Inquiries. By J. W. Stapleton, Surgeon, Trowbridge, Wilts, London: 1861, pp. 379.

let the ghastly deed shoulder us, as it were, it matters not in how trite a fashion—let the battered, hacked, or bullet-probed body of a vagrant or cadger, killed, perhaps, in a drunken brawl, be found in the ditch that bounds our demesne, or in a by-way that skirts our hamlet or little town, or within the margin of the wood that forms so picturesque an item of our every-day prospect, and whose shady recesses and wild paths form our best loved lounges, or in a nook or alley of the street we live in, or in the back-slums over which we gaze from the rear of our house in city or town—let murder thus shoulder us, and not even the absorbing whirl of active life will save us from the thrill of horror which follows from the near contemplation of the dire deed, and from the acute interest which surges up in our souls and eggs us on to learn every detail of the detested action.

How strange it is, and seemingly how paradoxical, that death in its first-begotten and most revolting aspect, should charm us to its contemplation, and evoke feelings which, if not positively pleasurable in themselves, yet give rise to a certain reflex of emotion from which we derive an undoubted but peculiar gratification. Let us not too hastily exclaim that this view is derogatory to humanity. We are here dealing with facts rather than opinions. The intimate relationship between antithetical emotions is a fact of no new date. The Executioners of the Law had, on the morning of the fatal day, removed the chains which restrained Socrates, and he sitting upon the edge of his bed, and rubbing his cramped leg, smilingly observed to the friends who now stood around him: "How strange a thing is that, my friends, which is called pleasure; and how oddly is it connected with its supposed opposite, pain. Pleasure and pain do not come to a man together, but if a person runs after the one and catches it, he almost invariably catches the other too, as if they were fastened together at one end. I think if *Cæso*p had noticed this, he would have composed a fable to this effect: that the gods tried to reconcile these two opposites, and not being able to do this, fastened their extremities together; so that when you take hold of one, it pulls after it the other. And as it happens to me now, there was pain in my leg when the chain bound it, and now comes pleasure following the pain."* And *Phædo* thus describes the emotions which affected him on witnessing the judicial murder of the great philosopher:—

"I experienced peculiar emotions on that occasion. I did not feel compassion, as one might have expected I should, on being present at the death of a dear friend. I assure you, *Echestratus*, he appeared to me happy, both from his behaviour and from his discourse, with so much calmness and magnanimity did he meet death. I felt persuaded

* *Phædo*, Whewell's trans.

that he quitted this life under divine protection; and that in another world he must be happy, if any one ever was. On this account I had no painful feeling of pity as might seem natural to a person present at such a catastrophe, nor did I feel pleasure, as on ordinary occasions when we were talking philosophy; though the discourse was of the same kind. It was a peculiar feeling which possessed me: a strange mixture of pleasure and grief, when I thought that he would soon cease to be. And we were all in this same mood—sometimes laughing, sometimes weeping; especially Apollodorus: he wept violently. You know the man and his way.”*

We speak, therefore, rightly of the luxury of grief,† and with equal justness of the gratefulness of terror.‡ From this close linking together of painful and pleasurable emotions, Sir W. Hamilton conceives a strong confirmation is derived of the doctrine “that all pleasure is a reflex of activity, and that the free energy of every power is pleasurable;”§ and he argues (very aptly for the point we have in question) that on the same principle is to be explained the enjoyment which men have in spectacles of suffering—in the combats of animals and men, in executions, tragedies, and so forth, a disposition which, as he observes, “not unfrequently becomes an irresistible habit, not only for individuals, but for nations.” He further adds:—“The excitation of energetic emotions painful in themselves is, however, also pleasurable. St. Austin affords curious examples of this in his own case, and in that of his friend Alypius. Speaking of himself in his *Confessions*, he says:—‘Theatrical spectacles were to me irresistible, replete as they were with images of my own miseries, and the fuel of my own fire. What is the cause why a man chooses to grieve at scenes of tragic suffering, which he would have the utmost aversion himself to endure? And yet the spectator wishes to derive grief from these; in fact, the grief itself constitutes his pleasure. For he is attracted to the theatre, not to succour, but only to condole.’”

* *Phædo*, Whewell’s trans.

† — “Mourning and grieving for all, oft-times sitting in my palace, sometimes again I am delighted in my mind with grief.”—*Odyssey*, b. iv. l. 100.

“*K. Philip*. You are as fond of grief as of your child.

“*Constance*. Grief fills the room up of my absent child,

Lies in his bed, walks up and down with me;

Puts on his pretty looks, repeats his words,

Remembers me of all his gracious parts,

Stuffs out his vacant garments with his form;

Then have I reason to be fond of grief.”—*King John*, act iii. scene 3.

‡ “Each trembling heart with grateful terrors quell’d.”—*Akenside*.

§ *Metaphysics*, lect. xlv. More fully:—“We feel positive pleasure in proportion as our powers are exercised, but not over-exercised; we feel positive pain, in proportion as they are compelled either not to operate or to operate too much. All pleasure, thus, arises from the free play of our faculties and capacities; all pain from their compulsory repression or compulsory activity.”

In further illustration, Sir W. Hamilton cites in part St. Austin's account of the influence wrought upon his friend Alypius by the spectacle of a combat of gladiators. The story, as told by St. Austin, is of such great interest for our present purpose, that we give it without curtailment :—

“He [Alypius], not forsaking that secular course which his parents had charmed him to pursue, had gone before me to Rome, to study law, and there he was carried away with an incredible eagerness after the shows of gladiators. For being utterly averse to and detesting such spectacles, he was one day by chance met by divers of his acquaintance and fellow-students coming from dinner, and they, with a familiar violence, haled him, vehemently refusing and resisting, into the Amphitheatre during these cruel and deadly shows, he thus protesting :—‘Though you take my body to that place, and there sit me, can you force me also to turn my mind or my eyes to those shows? I shall, then, be absent while present, and so shall overcome both you and them.’ They hearing this, led him on, nevertheless, desirous, perchance, to try that very thing, whether he could do as he said. When they were come thither, and had taken their places as they could, the whole place kindled with that savage pastime. But he, closing the passages of his eyes, forbade his mind to range abroad after such evils; and would he had stopped his ears also! For in the fight, when one fell, a mighty cry of the whole people striking him strongly, overcome by curiosity, and as if prepared to despise and be superior to it whatsoever it were, even when seen, he opened his eyes, and was stricken a deeper wound in his soul than the other, whom he desired to behold, was in his body; and he felt more miserably than he, upon whose fall that mighty noise was raised, which entered through his ears, and unlocked his eyes, to make way for the striking and beating down of a soul, bold rather than resolute, and the weaker, in that it presumed on itself, which ought to have relied on Thee. For so soon as he saw that blood, he therewith drank down savageness; nor turned away, but fixed his eye, drinking in pleasure unawares, and was delighted with that guilty fight, and intoxicated with the bloody pastime. Nor was he now the man he came, but one of the throng he came unto, yea, a true associate of theirs that brought him thither. Why say more? He beheld, shouted, kindled, carried thence with him the madness which should goad him to return not only with them that first drew him thither, but also before them, yea, and to draw in others.”*

Those who are familiar with the horrible scenes of a Spanish bull-fight will, perhaps, most readily appreciate the vigour and truthfulness (if we may so speak) of this description. Even now, at a distance of several years, we can recal vividly the irresistible fascination which, when first we witnessed a bull-fight, overcoming the sickening disgust that had at the onset seized upon us, fixed us to

* *Confessions*, b. vi. c. 8.—Trans. revised by Dr. Pusey.

the seats of the arena. We were hemmed in by a bevy of elegantly attired ladies. The first bull, a magnificent, sharp-horned, clean-limbed, savage brute, had just entered the ring, and, almost without a pause, rushing upon one of the picadors, had plunged its horn up to the very root into the chest of the animal he bestrode, and hurled horse and rider over as if from a catapult. The voices of the women outvied the men in crying "Bravo, bull!" and heaping pleasant epithets upon the brute, which now stood with head erect, beating its tail upon its flanks, and glancing its glaring eyeballs around, near the centre of the arena. The picador was hastily dragged from beneath his horse, and the latter struggled to its feet, but almost immediately fell again, the blood pumping out from the ghastly wound in the breast. We could not withdraw our eyes from the horrible sight, and were compelled, as it were, perforce to keep them riveted upon the agonizing convulsions and struggles of the dying animal until it lay a lifeless carcass on the sand. In the meanwhile the scene had been again and again enacted, with variations too fearful to recount, and several horses, some dead, others dying, strewed the arena. At each successful plunge of the maddened bull the excitement of the vast multitude had increased step by step, until it culminated in one frantic tumult of applause, when one horse was literally ripped open from the thigh to the breastbone, and the rider hurled senseless to the ground. Then the welkin was filled with exulting shouts; the amphitheatre trembled beneath the thunderous beatings of the long reeds which many of the spectators held in hand; brave terms were showered upon the gallant bull, and a yell of execration was hurled at the unfortunate picador as he was raised from the ground and carried from the ring. How we sat the scene out, and much that followed, is a marvel to us now, but we could not drag ourselves from the spot. We were fixed, as it were, by a spell, and it was hard to resist joining in with the rapturous excitement around.

The fascination which the contemplation of murder exercises upon us appears to be, in its sensual aspect, closely allied to, if not in its essence identical in character with, that which seizes hold of the feelings when we gaze upon a spectacle of fierce and bloody contention, such as those to which we have referred in illustration. It is an ultimate fact, which admits of no explanation, and which is linked to that instinctive passion for physical action that is peculiar to all animals, and which is most conspicuously shown in man by his warlike propensities. "Every animal," Adam Ferguson has finely said,* "is made to delight in the exercise of his natural talents and forces: the lion and

* *Essay on the History of Civil Society*, pt. i. sec. 4 : quoted by Sir W. Hamilton.

the tiger sport with the paw; the horse delights to commit his mane to the wind, and forgets his pasture to try his speed in the field; the bull, even before his brow is armed, and the lamb, while yet an emblem of innocence, have a disposition *to strike with the forehead*, and anticipate in play the conflicts they are doomed to sustain. Man, too, is disposed to opposition, and to employ the forces of his nature against an equal antagonist; he loves to bring his reason, his eloquence, his courage, even his bodily strength to the proof. His sports are frequently an image of war; sweat and blood are freely expended in play, and fractures or death are often made to terminate the pastime of idleness and festivity. He was not made to live for ever and ever, his love of amusement has opened a way to the grave."

This passion for the free exercise of the physical powers we possess underlies that emotional attraction to which the unrestrained and utmost exhibition of those powers, however sad and revolting, gives rise to. How hard it is to eliminate or keep in check, even under the happiest circumstances, the instinctive delight for violent or dangerous sports, was pretty conclusively shown by the outburst of popular enthusiasm which broke out, in this country, last year, on the brutal combat between Sayers and Heenan.* At the present time, also, M. Blondin's terribly

* While this article was passing through the press, a Prize-fight occurred—a so-called "Fight for the Championship"—between one Mace, a very small man, "Champion of the Light Weights," a professed pugilist, and a gigantic Lancashire blacksmith, named Hurst, of Herculean strength, but unskilled with his fists. The following extract is from the account of the fight in the *Times* (June 19th) and it is worthy of note that the same paper on that day reports that the Secretary of State, the night previous, had announced in the House of Commons, that he had effectively interfered in putting a stop to one at least of M. Blondin's horrible freaks, to wit, his making a little child a party to his dangerous performances. Is it not a curious coincidence that at the time when the Crystal Palace Directors are maturing a plan by which they can evade the law, and open the Palace grounds to a great extent to the public on the Sunday, they should also secure M. Blondin's services for the delectation of the people? The former step is sought to be justified by the ordinary platitudes of the physical welfare of the people, Sunday a day of bodily as well as spiritual rest and enjoyment, and so forth. But in what category of the innocent and instructive amusements, which the Company profess to cater for the public, does M. Blondin rank? The appearance of M. Blondin in England, under such patronage, casts a very dubious light upon any efforts for relaxing somewhat the strictness of Sunday observances under the same patronage.

"Hurst," the report of the fight in the *Times* states, "knew evidently nothing of boxing, and his antagonist therefore merely drew aside with the most perfect *sang froid* from the slow, awkward movements of the ponderous arms, delivering his own strokes full on the head and face of the giant with a force and rapidity that was terrible. In vain, like a blind Cyclops, Hurst threw his arms abroad, and strove to grasp, to strike, even to touch, his lithe wiry foe—in vain he strove to hem him into a corner. Mace would simply inflict his tremendous blows full on the smashed face of his opponent, pass under his arm, and be gone, almost before the eye could follow his movements. Hurst was literally deluged with blood, which poured over his huge figure in such streams that Mace himself was covered with it, and the clothes of Hurst's two seconds almost saturated. Nothing showed the enormous strength

exciting and dangerous gymnastics at the Crystal Palace are calling forth another phase of the same feeling—heightened, doubtless, by the fact that a fellow-acrobat was crippled for life by exhibiting less dangerous feats in town a few weeks ago.*

But there is a psychical as well as a sensual phase of this passion for the terrible. In the latter, the more instinctive phase, man is barely elevated above the level of the brute beast. There is no stronger evidence of an individual becoming or being *brutalized* than the sensual phase of the passion assuming in him an irresistible sway. It is only when we turn to the psychical phase that we recognise the true significance of the passion in man, and in what manner emotions seemingly inconsistent with true humanity become the substratum and vital spring of the highest humanity. For, if on the sensual side these emotions are characterized by a mere brutal gratification in the horrible, on the psychical, they

of the man more than that he could sustain this fearful punishment and loss of blood with apparently little diminution of his colossal power. He still pursued Mace with unabated determination, but never once even touched him, while, on the other hand, Mace's blows sounded loud all over the ring, till from a sharp crushing smash they gradually deadened down to a splashing sound like striking raw meat, that was sickening to hear. Nothing stopped the copious streams of blood that flowed from all parts of Hurst's face, and the whole of this one-sided contest became disgusting and horrible beyond all description. After there had been ten rounds, and the fight had lasted some three-quarters of an hour, Hurst's seconds and backers saw that his chance was hopeless, and urgently strove to make him discontinue. But, though now utterly blind, his features smashed out of all recognition almost as a human being, and reeling from his fearful loss of blood, the gory disfigured giant still tottered from his corner, only to be sent staggering back by an antagonist that he seemed capable of annihilating. Mace now no longer fought cautiously, but hit when and where he pleased, and even closed with the great wrestler and threw him heavily. It was all over. Hercules himself would have succumbed to such fearful blows, and the alarming hæmorrhage which followed them, and which now began to soak all the grass of the ring. Brettle, Hurst's chief backer, at last rushed into the arena, and insisted on his fighting no more, but the maimed giant seemed incapable of understanding his defeat from such a little man, and groped and staggered out again. Blind and fainting, it only required one or two more blows to finish the affair; but the infliction of those on the helpless heap of flesh was horrible and sickening beyond all description. His seconds and backers gave in for him without his knowledge, and kept Hurst in his corner till he gradually became almost insensible, and all the restorative arts of the ring were exhausted in efforts to keep him from fainting, which, in the absence of a surgeon, and in his then fast failing power, might have been a most serious affair. The spectacle which he presented is too horrible for description. Even the oldest champions of the ring were aghast at the fearful punishment inflicted in fifty minutes. Mace had not a single mark on him. The dockyard police were despatched in a steamer from Chatham to prevent the fight, and arrived just as it was over—quite official that. It is a kind of set-off to this revolting business to say that poor Hurst's comrades on both sides were most solicitous in their care of him after his defeat, and Mace went about among them and raised a subscription for him amounting to 35*l*. Such facts, though undoubtedly praiseworthy, but poorly counterbalance the nature of the whole contest. Yet pugilists think that in a few years the ring will again glow with all the brutal magnificence of the days of the Regency. Revive the ring! It would be easier to restore the Heptarchy."

* In the arena where the accident happened, a still more daring acrobat is now nightly delighting a crowded audience.

arouse and minister to the holier feelings of sympathy and pity, and are the most powerful awakers of the idea of justice. It is this then, the psychical phase, and the capacity of manifesting it, which constitutes the distinctive and true character of this passion for the horrible in man. The perfecting of this capacity rests with man himself.

We may now comprehend in what fashion the fascination which murder exercises over us contributes to the higher feelings of humanity. If the act simply affected us with blank horror, and there was no recoil of the feelings, neither sympathy, nor pity, nor justice would be practicable. Every energy of the mind would flag and fail whenever and however the act were contemplated, and we should seek at all hazards to avoid the terrible theme. But by an inscrutable law of nature the horrible itself has its peculiar attractions; we are drawn instinctively to its contemplation; and from that contemplation arises, in the rightly-constituted mind, emotions that dignify and ennoble man. Thus, as the least consequence, murder sets every mind on the stretch, and the murderer is tracked not merely by the officers of the law, but by the active thoughts of an entire people.

But the psychical phase of the passion for the terrible is not only manifested through the ethical feelings, but also through the æsthetical. "Whatever is in any sort terrible," writes Burke,† "or is conversant about terrible objects, or operates in a manner analogous to terror, is a source of the sublime." The tragic poet seeks in murder the materials upon which to exercise his great art; and the Tragic Muse is depicted with the dagger in one hand, the poison bowl in the other. As Bulwer Lytton has happily said, Crime "has afforded to the master of human nature his amplest scope for investigating the most subtle and hidden recesses of character and passion, unravelling the skein of intellectual error, and holding up to a thoughtless world those striking and solemn warnings in which the most direct morality of tragic composition may be said to consist."†

De Quincey, in his extravagant essay on "Murder considered as one of the Fine Arts," keenly satirized a perverted or debased taste in the contemplation of the act, which is occasionally met with, and which is best left to the lash of the satirist.

Of the causes which contribute to the energy of the emotions with which we regard murder, and which most intensify them, mystery and strangeness occupy the chief place. The latter provokes to fuller action the most dominant feelings, the former prevents these flagging. But the action of both causes is to a

* *On the Sublime and Beautiful*, part i. sect. 7.

† A Word to the Public: Appendix to *Lucretia*. Ed. 1853.

great extent relative to other circumstances, which are liable to a wide range of variation in degree of intensity, and which are intimately concerned in fostering and augmenting the horror with which murder affects us. These circumstances may be summed up in the term *domesticity*, by which we mean to convey the notion of domestic or family life in its widest sense. For example, in the instance of the murder recently discovered on the Rhine, and to which the attention of the English public has been so forcibly directed by successive advertisements in the *Times*,* mystery and strangeness exist to an extent rarely paralleled, yet despite the interest with which we regard the event, we miss the *swell* of emotion with which murder of a character so barbarous commonly affects us. No doubt, in this case, something must be ascribed to distance in weakening the influence which the crime exercises over us. But, even in the perhaps still more striking example, the discovery of murdered and butchered remains on Waterloo-bridge several years ago, notwithstanding the horrible character of the crime and its impenetrable mystery, we question if for a moment it would be maintained that the feel-

* *Advertisement from the TIMES of May 9, 1861.*

"In an almost impenetrable ravine in the declivity of Mount Rheineck, which is situated immediately on the banks of the Rhine, between Brohl and Niederbreisig (a district of the Tribunal of First Instance of Coblenz, Rhenish-Prussia), on the 22nd of last March, was found the body of some person, a female, from twenty to thirty years of age, or thereabouts, concealed in a recess, covered with large stones. The period of decease cannot be precisely determined. Death was caused by a ball shot from a gun, which traversed the breast and back. Description—height, five feet two or three inches; hair, fair; teeth, sound, small, and somewhat irregularly set in the lower jaw. Dress—one chemise, cambric, three feet six inches long, the upper hem forming a running string, with two eylet-holes, two fine and even cords passing through; in the centre of the round breast of the chemise, and below the eylet-holes, the initials 'A. H., 36,' are embroidered in Gothic characters, in relief, half an inch long. 2. A night-gown of fine white dimity, collar turned down, two feet three inches, with white mother-of-pearl buttons; some remains of a fine material, with brown and white stripes (jaconot muslin); in the white stripe is a small winding white line, with red spots. In the vicinity of the body have been found the remnants of a petticoat, three feet two inches long; it is composed of fine white dimity, striped, the same material as the nightgown. On the upper edge, which is an inch and a half broad, with white riband strings, are embroidered in white letters, two and a half lines, in relief, and in large characters of the German printed alphabet, the initials 'M. R., 6.' The bottom hem is finished with a cord in linen thread. The fine quality of the materials and the elegant make of all these articles indicate that the victim belonged to a rich class. In consequence of the state of putrefaction and external destruction it is impossible to notice other marks of recognition. I request of any person who can give information concerning this unknown individual, and the circumstances of her death, to be so good as to furnish me with the particulars, else to communicate them to the nearest magistrates. The articles of dress above mentioned, together with the lower jaw, are deposited for inspection at my office.

"The Crown Prosecutor-General,

"DE RODENBERG.

"Coblenz, April 25, 1861."

ings excited by it at all approximated in intensity or duration to those aroused by the murder at Road Hill House, twelve months ago.

The influence of *domesticity* in heightening the emotions excited by violent death admits of ready illustration.

It has been our lot to become exceedingly familiar with Death in almost every form—in his quieter and more seductive, in his harsher and more repulsive moods—as he has arrested life in bed, in the highways and byways of the country, in the crowded streets of the town—now when he has suddenly tripped up an individual as he was going soberly about his daily avocations or was rollicking in the mad glee of a drinking-bout, now when he has swept along in the pestilence or held high carnival on the field of battle. For months our chief associates have been the dead. We have lived among them from early morning until midnight, and often from midnight until daybreak; and when we sought rest, still but a thin wall of lath and plaster separated us from them. The suicide, the gallows-bird, and the “found dead,” the vagrant, the deserted, the lost—such were our lifeless and lone companions by night; and frequently as midnight has stolen into morning, have we sat among them, and by the light of a lamp, or by the pale rays of the moon, we have gazed long upon the hushed forms of our ghastly and undraped comrades, listening to the wind as it whispered about the windows, and at times watching curiously the sudden motion of a straggling lock of hair, which, tossed up by a stray eddy, would give a temporary semblance of vitality to a corpse. A singular kind of friendship, the result of our solitary vigils, sprang up between ourselves and the dead; but notwithstanding the extreme familiarity thus created with death, it never blunted that strange thrill of fear which death as Murder communicated to us. Even when we were living, so to speak, hand and glove with the dead, we could not entirely overcome the dislike to pass, by night, along the lane where the pedlar was found beaten to death, or the copse where the missing game-keeper had been discovered shot through and through and drained of his life’s blood, or the deserted cottage where the assassin’s knife not long ago was too busily at work, or the foliage-fringed pond from which the body of the little infant had been fished out. But this by the way.

It is a strange study to mark the influence of death upon the feelings as met with on the field of battle, in the deadly routine of the trenches, under the horrible mitraille of a close cannonade, or in the fierce rush and hideous confusion of the assault, the mine springing like a volcano beneath the feet of the men in advance, and rending them to pieces amid fierce tongues of vivid flame.

— It is a clear hot day in the early spring of 1855. A

brisk breeze is crisping the dark blue waters of the Euxine, and Sebastopol, lying like a white cloud upon the deeply indented shore, looks the very emblem of peace as we gaze upon the city from the ridges of the hills that hem it in. But for the rushing out of jets of pure white smoke from the earth, as it were, at intervals, along the slopes that run down to the defences, and the loud reverberation of a heavy gun from time to time, and the occasional sudden flecking of the pure sky above the devoted city with a bursting shell, there is little at first to tell of war. Let us approach nearer. We have strayed into Gordon's Battery. The ponderous guns are comparatively idle, and the men are lounging beneath the vast earth-works. Presently the Malakhoff and Redan awake up and hurl a storm of round shot and shell into the battery. Keep close! A slight report in the air above us, a sharp whiz, a jagged, black fragment traverses the field of vision, and in a moment the tall, fine sailor to the right is torn open, a quiver of the limbs, and he is dead. A bustle around the body, a hasty exclamation or two of regret—but, keep close! Round shot and shell are plunging into and tearing up the ground in the rear of the guns. A piece of canvas is thrown over the body until it can be removed, and Jack quietly turns again to do the honours of the battery to the startled stranger, and even ventures on a joke or two. Is this insensibility?

— The Mamelon has fallen, and a truce has been declared for the burial of the dead. Eighty corpses, horrid in the hideous disfigurement of wounds and approaching putrefaction, have already been laid in two rows in rear of the second parallel, preparatory to burial. The trenches in the vicinity of the dead are crowded with men, who, while watching the movements of the burial parties, fret the tainted air with laughter, and jest, and oaths. Shut the eyes, and you might think yourself in a crowded cabaret; open them, and they rest on the two lines of dead, who, with faces turned towards heaven, lie before their mirth-brimming comrades, with whom they had fought shoulder to shoulder but two nights ago.

— The plain of the Tchernaya, rich with luxuriant grass and gay with flowers, is flooded with morning sunlight. A long line of dust beneath the distant cliffs marks the track of the retiring Russian columns, but an occasional shot is still thrown, from the heavy guns at the foot of the hills on the left, upon Tractir Bridge, around and about which the dead and the dying are lying in profusion. Mind your horse does not strike the wounded as you push down to the bridge, or become entangled with the dead as you ford the river. But draw rein as you reach the opposite bank. What strange sound is this? The cry of the wounded, hundreds of whom are lying within the glance of the eye, and hundreds more are concealed in the long grass? No! simply full-voiced laughter,

overbearing even the brisk talk of the victorious troops on the bridge and within the breast-work to the right and left of it. Turn aside a little, and in a slight hollow, fringed sparsely by brushwood, we come upon half-a dozen Russian soldiers, all so severely wounded that not one can stand erect. They have had their wounds dressed on the field, and are awaiting their turn for removal, and in the meantime they are making merry with the French soldiers in the immediate vicinity. They shout out harsh sentences, doubtless rough Russian jests if they were understood, and then burst into paroxysms of laughter, in which their captors are not backward in joining. A merrier group could not be desired, yet it is fixed in the midst of a very crush of the dying and the dead. Within a little mile 3000 of the latter were lying.

— Once more. It is early morninig after the fall of the Malakhoff. The passages between the gigantic walls of earth are cumbered with the dead and wounded. Here and there corpses are piled upon corpses, and the flaunting red and blue of the French uniform peers out beneath the brown of the Russian. It is but needful to glance briefly around to learn in how ghastly yet how varied a guise, shell, and shot, and bayonet, and powder, and fire can do their work. It is a very saturnalia of the dead and dying; and in sullen yet bootless vengeance a shell is ever and anon thrown into the midst of it from the Russian batteries across the harbour. Yet the sounds we hear would befit a saturnalia of the living rather than dead. There is a pile of (we counted thirty) bodies, French and Russians, and near it are squatted a group of soldiers, surrounded by plunder, and singing with the fullest voice a jovial drinking-song. The shattered defences ring to the song, and the chorus itself is shouted back by many voices in other parts of the conquered work.

And so we might multiply almost endlessly fact upon fact, showing how little violent death, however horrible, in a foughten field, away from any of the incidents of home, affects the feelings of the combatants. Yet we also might multiply other instances, showing that this arises from no want of sensibility. From the Malakhoff, from the Mamelon, from the Tchernaya, we could cull stories of overbrimming kindness towards friend and foe, of tenderness towards the wounded more like that of a woman than of a fierce and hardy man, and of kindnesses towards the dying which make the heart beat with emotion. To the dead there is no help—to the living there is; and the soldier consigns his comrade hastily to the grave, with a brief expression of regret, knowing that he himself may be laid in one to-morrow, and reserves his active sympathy for the living. But the same man who in war seems to be heedless as a brute, or, very like a brute,


appears, as it were, to revel in blood and death, in civil life might be utterly unnerved to witness a man accidentally killed or seriously injured, and might dread to be brought face to face with death in a sick-bed. We have known veterans of many a bloody fight sicken to see a child's crushed finger, and fear to sleep in the same house with a corpse.

Whence comes this marvellous difference of feeling in the same man in contemplating Death? The answer is not far to seek, and is to be found in the absence or slight degree of home feeling which surrounds death in the one case, its presence in the other. Death under any circumstances excites a nameless fear, but the tension of this fear is in direct proportion as death intrudes upon the sacred hearth of domestic life. It is a fear that is most acutely experienced among home-born joys, that is fullest fed by the wailings of children, of parents, of friends, of all who are dearest in consanguinity or amity—wailings which surround the death-bed with an atmosphere of grief, from the influence of which none can escape—a grief which augments in intensity with the abruptness of the dread intrusion. Death comes in its mildest form in sickness, for we all expect it, and know that sooner or later it is most likely to come, in this form; hence, when it approaches thus, even when sudden like a thunderbolt, we are less shocked than when it comes upon us by a sudden accident. But even death by an accident—say by the destruction of a railway-train—is a form of its visitation to which, as we are compelled to admit, we are liable in a very appreciable degree, and thus a certain amount of submission qualifies the terrible event. But death by MURDER!—we cannot, or rather we will not, estimate any chance, any likelihood in the ordinary life of a civilized country, of its drawing near to us in this fashion, a fashion which passes beyond the reach of common probabilities. And so when it thus does come upon us it comes with a nakedness of horror which puts to rout even the laxest morality, and stirs up the most sluggish soul from its deepest foundation. Our sense of security from death, in short, is greatest in respect of murder, less in prospect of accident, and least of all in face of sickness; and the shock to the feelings occasioned by death is in no small degree proportionate to the disturbance of the degree of security we ourselves feel from its approaches. Add the element of domesticity—of home feeling, of family life—and we may, in some sort, measure the variation in degree of effect with which even murder, horrible at all times, but even itself susceptible of increment of horror, affects us. Thus we may learn to apprehend, in some respects at least, how it came to pass that the murder of Mrs. Ruscombe and her maid, in the middle of last century, of the Marr family, at the beginning of this, and of Mr. Kent's child at Road, last year, exercised so awful and enduring an in-

fluence upon the people—three examples of murder which (to use an expression of Southey in respect to the destruction of the Marr family) were private events of that order which rose to the dignity of national events.

Mrs. Ruscombe lived with a single maid servant in College Green, Bristol. One morning they were both seen alive, and moving about, as usual, at ten o'clock; at noon both were found murdered. The mistress lay dead in her bedroom; the servant upon the stairs. To this day not one ray of light has been thrown upon this strange murder, perpetrated near midday, in a house overlooking a busy street, and in the heart of a busy city.

The Marr family lived in the vicinity of Ratcliffe Highway. Marr kept a small shop, and late one Saturday evening, in 1812, while the servant girl was out on an errand, he, his wife, the apprentice boy, and infant child, were all deliberately murdered. Marr was found dead behind the counter, the wife and boy in the centre of the shop-floor, and the baby in its cradle in the kitchen. The murderer had escaped through a yard in the rear of the house, but for the rest all was mystery. A fortnight after the occurrence of this terrible series of murders, another house was entered in the same vicinity, also on a Saturday evening late, and the head of the house, an old man of seventy, named Williamson, his wife, and servant-maid killed whilst pursuing the avocations they were engaged in at the time. It was manifest that these murders were effected by the same hand or hands that had extirpated the Marr family, and the awful and wide-spread fear excited by the previous murders increased to a literal panic when the murder of the Williamsons had been discovered—a panic which hardly ceased when the murderer (Williams) had been happily discovered and brought to justice. Speaking of this panic to De Quincey, Coleridge observed that he did not consider it at all unreasonable, "for in the vast metropolis there are many thousands of households composed exclusively of women and children; many other thousands there are who necessarily confide their safety, in the long evenings, to the discretion of a young servant girl, and if she suffers herself to be beguiled by the pretence of a message from her mother, sister, or sweetheart into opening the door, there, in one second of time, goes to rack the security of the house."*

 "It would be absolutely impossible adequately to describe the frenzy of feelings which," writes De Quincey, "throughout the next fortnight (after the Marr's murder), mastered the popular heart; the mere delirium of indignant horror in some, the mere delirium of panic in others. For twelve succeeding days, under some groundless notion that the unknown murdered had quitted London, the panic which had convulsed the mighty metropolis diffused itself over the island. I was myself at that time nearly three hundred miles from London; but there and everywhere the panic was indescribable. One lady, my next neighbour, whom personally I knew, living at the moment, during the absence of her husband, with a few servants in a very solitary house, never rested until she had placed eighteen doors

Equally great had been the panic excited by Mrs. Ruscombe's murder, but, if aught, it proved more lasting from the impenetrable mystery which enshrouded it.* Both cases begot a terrible sense of domestic insecurity, that, unfortunately, we are but too well enabled to appreciate from the recent experience of the Road murder, which in barbarity and in mystery exceeds even that of Mrs. Ruscombe and maid. But in all these three cases we may see that it was not so much the mystery, temporary or persistent, the strangeness, or the barbarity of the crime which constituted the chief elements of panic, but the *domesticity*, and the awful feeling of insecurity carried in consequence into every household. What family was or could be safe from the intrusion of murder under such guises? Not one.

No incident, De Quincey tells us, referring to the murder of the baby in the massacre of the Marr family—no incident, throughout the whole tissue of atrocities, so much envenomed the popular fury against the unknown ruffian, as the useless butchery of the infant. Nothing, it may also be said, aided more in intensifying popular feeling in the Road Murder than the fact that the victim was an infant. "It gives me the horrors to think of it," said one of the witnesses on the trial of the nurse-girl in that case; "I'm the mother of a large family myself, and know it." The child has a deeper hold upon our feelings than the adult. The helplessness and entire dependence of the former binds it to us with stronger-welded and purer links than those which attach man to man. How often and how painfully does the doctor experience this at the bedside. From his older patients he learns all he may want to know, and in them finds intelligent and willing assistants in all that he may wish to do; but not so with the infant. It can resolve no doubt, clear up no difficulty. It is entirely passive in his hands; entirely dependent upon his unaided skill and acuteness for relief of its sufferings. "Help me," the little thing seems to say by its cry, "for I am utterly helpless without you." And not only is the doctor's responsibility thus doubled, but his child patients contrive, in a thousand winning fashions, to creep into his heart, and

(as she told me, and, indeed, satisfied me by ocular proof), each secured by ponderous bolts, and bars, and chains, between her own bedroom and any intruder of human build. To reach her, even in her drawing-room, was like going, as a flag of truce, into a beleaguered fortress; at every sixth step one was stopped by a sort of portcullis. The panic was not confined to the rich; women in the humblest ranks more than once died upon the spot, from the shock attending some suspicious attempts at intrusion upon the part of vagrants, meditating probably nothing worse than robbery, but whom the poor women, misled by the London newspapers, had fancied to be the dreadful London murderer."

* Fifty years after the murder, the house in which it was effected remained deserted.

seize his affections, and so again to deepen still more his anxieties about them.

The Road Murder has recently been invested with additional interest by the publication, in a handsomely printed volume, with plans and illustrations, of the whole of the judicial evidence relating to it, and a critical review of that evidence, by Mr. J. W. Stapleton, surgeon, of Trowbridge, Wilts. Mr. Stapleton was present at the examination of the murdered infant, although not himself examined as a witness at any time. In other respects, also, he was placed in a favourable position for watching the progress of the case. His opinion upon the mode of murder differs somewhat from that given in evidence by the surgeon who officially examined the body, Mr. Parsons, and his criticism clears up one or two doubtful points in the case. But the great value of Mr. Stapleton's work consists in its presenting a connected and trustworthy account of one of the most remarkable crimes in English domestic history, and for this reason it will always prove of unusual interest.

The actual facts of the Road Murder are few and quickly summed up. On the morning of the 30th of June, 1860, the youngest child of Mr. S. S. Kent, an Inspector of Factories, residing at Road-hill House, Wiltshire, a fine healthy boy, four years of age, was found murdered, in a disused privy adjoining the house. The body, clad in a night-dress and under-flannel, and wrapped in a blanket from the cot in which the child slept, had been thrust down one of the apertures of the seat in the privy, but had been prevented falling into the soil beneath by the interposition of a splash-board. The throat was cut clean down to the spine, and a deep stab penetrated the chest on the left side. There was also a slight cut upon the fingers of the left hand. Much blood was found upon the inner side of the blanket, and some had trickled through and fallen into the soil beneath where the body of the child lay. Mr. Parsons considered that the child had been suffocated before the wounds were inflicted; Mr. Stapleton believes that the wounds were alone the cause of death; and in this view he is supported by the opinion of the coroner who held an inquest on the case, also a medical gentleman. It has generally been understood that the quantity of blood found in the vicinity of the body was much less than might have been expected, where death had arisen from extensive wounds, particularly when large bloodvessels had been divided; but Mr. Stapleton shows that this opinion is hardly tenable, as Mr. Superintendent Foley, of the local police force, has testified that the water in the vault beneath the body was stained, as he thought, "with much blood." A piece of flannel, described as a female's breast-flannel, was found beneath the

body, and a fragment of the *Times* newspaper of June 9th, lay on the floor of the outhouse. This piece of paper had apparently been used to wipe a bloody knife; but it was impossible to determine whether the breast-flannel had been thrust into the position in which it was discovered along with the child, or whether it had fallen into the vault some time previously. Moreover, no trace of the previous ownership of the flannel could be discovered.

For the rest; on the evening previous to the discovery of the murder, Mr. Kent's family, consisting of twelve members, including servants, had retired to rest as usual, Mr. Kent seeing that the house was safely secured for the night. The murdered child slept in a cot in the night nursery, another and younger child occupying another cot, and the nurse a bed in the same room. Early in the morning the nurse awoke, and noticed that the little boy's cot was empty; but, according to her statement, supposing that Mrs. Kent might have removed the child from the room, having perhaps heard him cry in the night, she went asleep again. She once more awoke about half-past six, and arose; but the fact of the child not being in Mrs. Kent's bedroom was not discovered by her until the usual time of her master and mistress rising, when she knocked at their bedroom door and asked for the child. She stated that she had tapped at the door once before, but no answer being given, she went about her usual duties until the ordinary time of Mr. Kent's dressing.

The housemaid, on first coming below stairs that morning, had been surprised to find the drawing-room door unlocked and slightly a-jar, and the shutters of one of the windows open, the window itself being slightly raised up. She, however, thought that the window might have been opened by some member of the family the previous night, to cool the room, after the servants had gone to bed, and accidentally left open, together with the door, and therefore she raised no alarm.

The child being missed, a search was at once instituted for it, and after some lapse of time the body was found as described. No sign of any one having forced an entrance into the house was discovered, and the only indications of egress from it were the open drawing-room door and window. The cot from which the child had been removed was not tumbled in the least, and the cot-sheets were found neatly turned back, as if by a practised hand, a blanket having been abstracted from between them. Not the slightest trace of anything connected with the murder could be detected within or without the house, except in the closet where the child was found, as we have already described. There could be no doubt, however, that the murderer must have been secreted within, or an inmate of, the house; but

beyond this conclusion, the keenest investigation was at fault. The suspicions of the police first fell upon one of Mr. Kent's daughters, a young lady sixteen years of age. Some asserted expressions of dislike towards the murdered child, and a missing night-dress belonging to the young lady, and which could not be accounted for, seemingly gave some colour to the suspicions, and she was arrested. Nothing, however, was brought forward in evidence before the magistrates to justify in the least degree her detention. Subsequently the nurse girl was arrested on suspicion, but in her case also there was not a tittle of evidence to connect her with the perpetration of the deed. The police were, in fact, utterly baffled; and the public, angered at the failure of justice, spared neither the authorities concerned in the investigation of the crime, nor Mr. Kent's family, but condemned the efforts which had been made by the one, and indulged in the gravest suspicions against the other. This outburst of popular feeling, notwithstanding the reprehensible character of its results in some respects, was perfectly natural. For the nation was called upon to rest content (and must unhappily perforce submit to do so) with the bare facts that, in an English home, on a summer's morning, in June, 1860, a lovely child, sleeping in the same room with its nurse, was taken out of its cot, removed from the house without any one of several sleeping inmates being disturbed, and murdered without the slightest trace of the murderer being discoverable. Strange indeed it would have been had public feeling remained passive under such circumstances. Doubtless there have been murders as mysterious, murders as anomalous, murders infinitely more barbarous in details, but never a murder in which mystery, singularity, and barbarity were so calculated to arouse whatever feelings of horror attach to the crime—never a murder so calculated to awaken a deep sense of family insecurity—never a murder so diabolical in its unoffending and innocent object, and in the exquisite care with which it was effected and concealed under difficulties of no ordinary character, or so astounding in the inexplicability of its motive. Whatever, indeed, could have contributed to the intensity of our emotions in the contemplation of murder (if the previous indications given of the circumstances governing those emotions are worth aught) is found present in the case of the Road Murder.

Having regard to this case, and looking back to the murder of Mrs. Ruscombe and maid, the Marr family and the Williamsons, not forgetting the more recent deeds of Good, the Mannings, Bacon, Rush, Palmer, Youngman, and Mullins, we are compelled to admit that De Quincey's phrase, applied to the present epoch, *The Augustan Age of Murder*, is not without a deep significance. The Road Murder, indeed, would seem to clinch his uncomfortable proposition (upon which the designation is founded) that more skill has been dis

played in effecting murder in the last two centuries and a half than in any previous period of history. We may, however, if we please, flatter ourselves that murder is less common, and even on the whole less barbarous—that is to say, that the barbarity of murder in the present day, for example, is, generally speaking, more refined than in any prior time.

We admit the proposition, and it will presently be seen that one or two somewhat important conclusions flow from it. Since the progress and mutations of crime in this country have been submitted to statistical observation, an opinion which had previously been entertained, to wit, that skill was becoming more and more conspicuous in the execution of crime to the displacement of violence, has been to a certain extent confirmed. Thus Mr. Samuel Redgrave, in his report upon the “Judicial Statistics for 1859,” published by the Home Office, states that—“The whole tendency of crime has been, for some years, to the diminution of offences of violence, and the increase of offences of planned theft and fraud—skill in crime has succeeded violence.”* It would seem, then, that what has been observed of murder is true also of crime generally, and that the greater prevalence of skilled murder is but a particular instance of a more general phenomenon.

Not unnaturally the more frequent manifestations of skill in crime have given, and give rise to serious surmises as to the probable effects of this greater aptitude for nefarious acts exhibited among the criminal classes. If crime becomes more closely allied to skill, it would seem apparent that its evil influence may be illimitably extended. If murder becomes conspicuous for and is a question of dexterity, and this dexterity be such as to set the best trained police at defiance, who would be safe? Nay, more; does not the frequent repetition of ghastly crimes—of frightful murders—within the last three or four years, indicate that there is not an inverse relation between the frequency of crime and the skilfulness with which it is perpetrated, as some would hope, but that the one increases progressively with the other?

The answer to these doubts is happily furnished to some extent by the statistics of crime we possess. And, first, it is highly probable that there has been no increase in the amount of murder in this country within the last thirty years. This conclusion is founded upon the commitments for murder for that period,† no statistics of the

* *Introductory and Explanatory Report*, p. xvi.

† *Commitments for Murder in Quinquennial Periods, from 1830 to 1859.*

1830-34	326	1845-49	365
1835-39	315	1850-54	348
1840-44	347	1855-59	345

In the thirty years population cannot be estimated to have increased less than 40 per cent. (which would account for a corresponding increase of crime), and property probably in a much greater ratio.—*Judicial Statistics*, 1859, p. xvi.

actual number of murders perpetrated existing until the year 1856. It is curious, however, to remark that there has been a progressive increase in the commitments for attempts to murder, stabbing, wounding, &c., within the same period. "This increase," we learn from Mr. Redgrave, "showed itself in a marked degree in 1857, on the extensive abolition of capital punishments which was then effected."* The amount of murder, therefore, remaining nearly stationary, notwithstanding a relaxation of the laws, followed by an increase of crime attended with serious bodily injury, it may justly be assumed that the more notorious murders of late years are not indications of an excess or increase of murder in the kingdom.

Again, it is not improbable that a greater prevalence of skilled murder (if we may so speak) is itself an index of a state of things much more amenable to restraint, than the prevalence of murder arising from the mere outbursts of animal passion. It may be surmised that the display of an increased skilfulness in crime arises chiefly from the greater difficulties interposed to the perpetration of crime by an active police. Now, Dr. Jarvis, the President of the American Statistical Association, in a paper read before the International Statistical Congress, held last year in London, pointed out that the tendency to repetition of crime was greatest in crimes arising from the passions and feelings, least in those which required or were governed by the intellect. "Passion and appetite being inherent or excited in the animal constitution, or permitted to govern the individual to whom they belong, are not so easily nor so commonly repressed by the ordinary punishments, or restrained by repentance and reason, as the misplaced selfishness which endeavours to succeed by plan and calculation."† This conclusion being confirmed, it is not perhaps unreasonable to infer that, in the case of murder, the restraining influence of the law will prove more effectual in proportion as the influence of passion is curbed and controlled by craftiness and forethought.

Thus a little hopefulness for the future may be extracted even from the murder at Road-hill House; and this hopefulness is strengthened by the fact (vouched for by Dr. Farr‡) that few countries present so low a proportion of murders as England.

* *Judicial Statistics*, 1859, p. xvi.

† Dr. Jarvis's paper will be found on p. 391 of the present number of this Journal.—Ed.

‡ *Nineteenth Annual Report of the Registrar-General*, p. 198.

ART. X.—MISCELLANEA MEDICA.

I. MY LORD BERKELEY'S COPPER NOSE.

Henry, Nineteenth Lord Berkeley :—" In the second of Queen Elizabeth [1559], having in March extremely heated himself by chasing on foot a tame deare in Yate Park, with the violence whereof he fell into an immoderate bleeding of the nose ; for the stay whereof, by the ill coonsel of some about him, he dipt his whole face into a basin of cold water, whereby that flush and fullness of his nose, which forthwith arose, could never be remedied, though for present help he had physicians in a few days from London, and for better help came thither himself not long after to have the advice of the whole college, and lodged with his mother at her house in Shoe-lane."*

II. A MEDICAL BET.

Catherine, Lady Berkeley :—" Being, in the sixteenth of Elizabeth, the mother of three daughters, and almost without hope of more children, especially of a son, which she, for the continuance of her house and her husband's name much desired, extreamly grieving that the male line of this antient family should end in her default, as she accompted it, she acquainted Mr. Francis Aylworth therewith, then of Kington Magna in Warwickshire, a little old werish man, but an excellent well-read practized chirur-gist and physician, and for many years a gentleman lodged in their house. He gave her hope of conception, yea of a son, if she and her lord would for a few months be ruled by him. This, in a private conference between these three, was agreed upon, and promised to be observed.

‘ Children are given to men ;
It's God that giveth them.’

She conceived, and in one year after this communication brought forth a son called Thomas, father of the Lord George, of whom I am next to write, to her unspeakable comfort, but never conceived after ; what time Mr. Aylworth told me this story, about ten years after, at Callowdon, which I have at second hand heard also, that the lord hath privately told to some others. He added, that some months, or thereabouts, before her time of delivery, she sent for him, and kept him with her ; and he (out of what obseruation I know not) being confident she went with a son,

* Fosbroke's *Berkeley Manuscripts*, p. 189.

offered to wage with her 10*l.* to 30*l.* that soe it was. She accepted the offer, most willing, no doubt, to loose, had the wager been thirty hundred. As soone as she was delivered, and understood it was a son, the first word she spoke was,—‘Carry Aylworth his thirty pound ;’ which purposely she had layd ready in gold in her chamber. This being the eleaventh of July, anno 1575. She also prevailed with her husband to sell him the said manor of Kington Magna in September following for 520*l.*, which he then held on lease for years.”*

III. MEDICAL PRACTICE, SIXTEENTH CENTURY:—EMPEROR CHARLES V.

“THE Emperor’s [Charles V.] stomach was this last week very much swoln, and he in great feebleness. The Queen, perceiving that pills made of soldanella, an herb that comes out of Italy, had done Monsieur der Ruellp good, purging his stomach of an incredible deal of water, and other raw and gross matter, willed Dr. Cornelius to break the matter to the Emperor, and to see whether his mind would serve him to take the same purgation. The Emperor agreed to it, and at four o’clock the next morning took it; which did so work his stomach, so purge him, that (saving your honours) he that did carry out that that came from him did faint by the way, and had much ado to keep himself on his feet, so much did the savour turn his stomach. It wrought on him nine times, besides twice upwards. We had not known of this, but J. Morysine, saving none would allow, have had need of Vesalius these five or six days, who, amongst other things, told me the Queen and Cornelius did utterly despair of his life. The Emperor, as he saith, is now as glad that he took it as the Queen and Cornelius were sorry that ever they consented to give it unto him. The physician doubts much the Emperor’s recovery; but he has a body so able to deceive physicians, and so able to live upon small strength, that till he be gone indeed we will think he hath still to tarry a little while; for, seeing the purgation did him no more harm, it must needs be that it did him much good. The Emperor’s apothecary told Ascham that his Majesty is very well amended, and will change his lodging out of the palace into his park garden, and will also shortly come abroad.”†

* Fosbroke’s *Berkeley Manuscripts*, p. 206.

† Sir Richard Morysine and Sir Thomas Chamberlayne to the Privy Council, from Brussels, 4th April, 1553. Lodge’s *Illustrations of British History*, vol. i. p. 208, 2nd ed. 8vo.

IV. CUTTING FOR THE STONE, 1608.

"Mr. Harry Willoughby, well known to your lordship, on Monday last, being (the 27th of this May) in the Old Bailey, at a barber's house (which barber cut up Mr. Kattrel when he was dead, thereby,) one Molenes, a man about thirty years, was cut for the stone in the bladder; and the bladder opened, and his instrument put in, and had ten pulls before he could get it. The stone is rough on both the sides; it is flat, and then round, like a flat bowl; almost as big as the ball of my hand. It seems he endured extreme pain with great impatience; yet this day, being Thursday, and the 30th of May [1608], he is very well, and like to recover."*

V. EPIDEMIC CATARRH OF 1580.

"We have here in London, and at the Court, a new strange sickness. It does grieve men in the head, and with a stitch over the stomach. Few do die thereof, and yet many are infected. I do hear it credibly reported that forty students of Lincoln's Inn were taken with the said malady within the space of twenty-four hours. At the Court, the Lady Lincoln, the Lady Howard, the Lady Stafford, the Lady Leighton, are at this instant troubled therewithal. The Lord Lumley's sick there, and many of the inferior sort. Some say the Lord Chamberlain is sick at Newhall."†

PLAGUE AT FULHAM, 1630—66. EXTRACTS FROM Y^R CHURCHWARDEN'S ACCOUNTS.

1630. An asseasement made the xxijrd daie of May, 1630, for further reliefe of y^e poore there, on Fulham side, for this present year, there being great cause, therefore, by reason of y^e poore's necessities in these times of scarcitie.

Total received . . . £3 6 0

1636. An asseasement made this sixth daie of September, 1636, for the reliefe of the poor on Fulham side, to remaine in stocke, according to his Matie's order, in case the infection of the plague should be.

Summe totall of this . . 15 15 0

* Alexander Ratcliffe to the Earl of Shrewsbury. Lodge's *Illustrations of British History*, vol. iii. p. 235, 8vo edition.

† Thomas Bawldwin to the Earl of Shrewsbury, 1 July, 1580. Ibid. vol. ii. p. 175, 2nd edition, 8vo.

1639.	Item, paid Osborne for two daies' warding at Lady Grivill's	£o	2	4
	Paid Henry Young for watching and warding at the same place	o	4	3
	Paid Young, for warding three weeks and five days	1	8	o
	Paid Kelly for watching two nights	o	2	o
	Paid Nicholls for warding	o	o	6
	Paid Elizabeth Jones and widow Payne for being at the Lady Grivill's	1	2	o
	Paid for Shycraft's dyet being shut upp	o	11	9
	Paid Gringle for Wood's wife being shut upp	o	15	o
	Paid for beefe for 3 visited houses	o	7	1
	Given to Goodwife Lake in her sickness, and for her keepe	o	10	o
	Paid for a sicke woman at the brickills, and for her keeper, the Easter daie last	1	15	o
1640.	Item, to the bearers that came from London, and a deal board to bear the corpses to churche	o	11	4
	Item, to Goodman Tucker, his house being suspected to be visited	o	1	o
	Item, for the relief of Fuller's house from the 13th of December, 1640, to the 1st of Februarie following	2	13	4
	Item, for the buriall of Fuller	o	2	o
1640.	Item, paid to James Francis Smyth, for a bar of iron, wht. 9½lb. at 3d. per pound, to close upp Powell's house door	o	2	4½
	Item, for Brade and his man's labour, to sett on the barr	o	o	6
	Item, to Goodman Burr for one week's wardinge	o	5	o
	„ Goodman Osborne for wardinge	3	o	8
	Item, for bushel of coles for y ^e visit-house	o	1	3
	Item, for the reliefe of Elizabeth Joans, being shut upp in a visited house at Mansion's Green from the 15th of April, 1641, to the 24th May	o	16	o
	Item, for a trusse of strawe for her to lie on	o	o	3
	Item, to Goodwife Baker, in tyme of her weakness, before she got right to the hospital, where she died a pitiful creature	o	6	o
	Item, to Eliza Joanes, at several tymes, for her wardinge	o	2	4
	Item, to Humphrey Phillips, for his attendance in tyme of sickness	o	4	6
	Item, for his knell, a shroude for him, his grave makinge, and in expenses in the house by those that bare him to church	o	6	2

	Item, for two trusses of strawe for him to lie on .	£0	0	6
	Item, paid to Danyell Carter for reliefe of him- selfe, his wife, and children, before his house was shutt up of his sickness	0	19	6
	Item, to Goodman Shute in tyme of his sick- ness and his wife's before her death	1	5	0
	Item, for a new spade to set him worke	0	3	4
	Item, to Goodman Watkins in tyme of sickness before he dyed	0	10	6
	Item, to Mr. Cluett for the knell and grave makeinge	0	0	6
1640.	An asseasment made y ^e last daye of February 1640, by John Bruton, churchwarden, and other the inhabitants of Fulham (on Fulham side) whose names are hereunto subscribed, and is for leaveying of 16 <i>l.</i> 4 <i>s.</i> 2 <i>d.</i> forthwith, which saide sume is to make up y ^e 8 <i>l.</i> odde money, formerley asseased for reliefe of the visited houses, 24 <i>l.</i> 17 <i>s.</i> 2 <i>d.</i> , which said some Walter Sheldon, one of the overseers of the poore on Fulham side, hath disbursed and laid out for the reliefe of the visited houses, from the 26th of October, 1641, to the first of February nexte following	16	4	2
23 July, 1665.	An asseasment for 60 <i>l.</i> for the reliefe of the visited houses and families on Fulham side, and to discharge the tax laid upon y ^e parish for relief of the visited in St. Giles.*			

Notes.—"Among the employments which the plague itself furnished was that of watching the houses shut up by authority, the inhabitants of which were not allowed any kind of communication whatever but thro' the watchmen who relieved each other every 12 hours, and whose duty it was to procure provisions and other necessaries for the house they were appointed to guard."†

"The justices of Middlesex, by directions of the Secretaries of State, began the practice (of watching houses infected) in the parishes of St. Giles, St. Martin, and St. Clements, about the latter end of June, or the 1st of July; the Lord Mayor and Aldermen adopted a similar practice in the city and its liberties; and in a week or two afterwards, the magistrates of the Tower Hamlets ordered the same measure to be taken in the eastern parishes. Watchmen were appointed to guard the houses if not shut up both by night and day, and over every door thus closed a large red cross was marked, with this supplicatory sentence printed over it—"Lord have mercy upon us."‡

* *An Historical and Topographical Account of Fulham, including the Hamlet of Hammersmith*, by T. Faulkner, pp. 141—144. London, 1813.

† *Brayley's London*, p. 400.

‡ *Ibid.* p. 389.

ART. XI.—COTTAGE ASYLUMS:—A SEQUEL.

By W. A. F. BROWNE, One of the General Board of Commissioners in Lunacy for Scotland.

“The Gheel system is not one that I should like to see followed in this country.”
—*Speech by Dr. Conolly at a Meeting to promote the Erection of an Asylum for the Middle Classes.*—*Times*, April 22, 1861.

THE preceding observations* upon this subject were intended to remove the difficulties which appeared to surround the conception of a Colony of the Insane; to reduce the proposal of engrafting such a benevolent scheme upon our social system to its real proportions; and to introduce such a modification of the principle as appeared attainable and adaptable to existing institutions in a plain and practical form. The sacred but debateable territory of Gheel shall not be trodden, it shall scarcely be touched again. But, in thinking out the thesis, it was early observed that to any effort to withdraw from their homes, natural position, and individual pursuits and objects, a large body of men, and compulsorily to assemble and retain them together for a common purpose, but one in which they felt no interest, towards which they might entertain a strong repugnance, or which they could not understand, the designation of a colony, at least in its ordinary acceptation, was singularly inappropriate. It was besides palpable that in any humble imitation of an institution which had been the growth of ages, which had grown with the faith of which it may fairly be claimed as a concomitant, if not a result,—like the ivy on mediæval towers—there would be lacking both the religious element, with which it was assimilated, if not identified, and the slow and gradual development by which it was characterized. In endeavouring to secure what was valuable in the experiment, it became obvious that it would be impossible to create at once in working order and with any chance of success, of even similar success, a machinery which had any parallel in history, any analogue in our present polity, any foreshadowing in the aspiration of our boldest philanthropists. It became imperative to seek a precedent; to discover a body of men, who, moved by other impulses than their own wishes or supposed interests, by causes differing altogether from the love of discovery, or adventure, or conquest, the craving for gold or gain, the surplusage of population and the off-casting of the parent hive, such as actuate ordinary emigrants to relinquish their original ties, or some of them; and who had been necessitated

* See No. II. of this Journal, p. 213.

to associate together, to submit to new laws and systems, and to act upon new and, in some respects, abstract principles ;—and to obtain from such communities sanction, and encouragement, and suggestions as to the innovation contemplated. Through the analysis many forms of social arrangement passed ; there were German villages in Spain, and French villages in Scotland considered, but in none of these could be recognised the principles or features required ; and yet, in other localities less connected with our race and habits were detectable peculiarities which pointed to a compulsory colony, originated for the benefit and gradual emancipation of its members.

I. It may seem bold and romantic to seek on the steppes of Russia, and among a people whose early architecture was compared by Gibbon* to that of beavers, for support to a modern theory. Yet the Cossacks, who appear mistily on the margin of history about a thousand years ago, when St. Dymphna lived and died, although represented by the Byzantines as a distinct people, repudiated by the Russians, yet claimed as Caucasians, were so increased by the aggregation from other countries and tribes, as to deserve the title of outcasts and fugitives ; lived in a land to which they did not belong ; were subjected to a species of serfdom from which they were liberated in virtue of services rendered, duties performed in relation to a moral standard which they did not erect ; and the professors of a certain faith and allegiance. Yet these hordes—migratory military, robber-like ; these bulwarks of the Russians and Poles against the gulf-stream of Eastern warfare were, in a certain sense, captives, devotees to a cause in which they had no selfish nor personal object ; laboured and fought for freedom and food ; they were celibats ; they were organized and subjected to a system of rule so rigid and omnipotent, as to annihilate individual will and to fuse into one common mass the heterogeneous and stubborn qualities of the most intractable materials. They hated the aborigines among whom they were planted ; they did not amalgamate with them ; they were in some respects superior to them, affording examples of industry and activity in their duties, of cleanliness and comfort in their dwellings. It is true that the descendants of these nomades have become the discoverers and conquerors of vast and valuable tracts in Asia, have undergone, under the shadow of a mighty monarchy, revolutions mimicking in their transition from democracy to tyranny those of distant empires ; that they have uttered their war-cry in the palaces of the capital of the West ; but even now there are preserved on the Don and Dnieper vestiges of the attributes which assimilated them to a settlement where the

* Chap. xlii.

inhabitants had no home, no family tie, to which they were confined by circumstances over which they had ceased to exercise control, and in the progress and prosperity of which they were blind, impassive, and not always willing instruments.*

II. It is, however, under a hierocracy that the more complete development of such a colony is discovered. The Church is the centre of the system. It is not the province of such an inquiry to determine either the precise objects, the means resorted to, or the results achieved in the missions of Paraguay; where, in common with the spirit which characterized European society, the sentiment of personal independence and the passion for individual liberty found no entrance. The priests by whom that marvellous organization was perfected were apostles, as far as going forth to propagate the truth with scrip and staff, and remaining penniless; they were martyrs, as watering the soil with their blood; they were philosophers, as leaving to us an example of what faith, order, training may accomplish when exercised by the gifted over the credulous, by the earnest and astute over the simple-minded. All the colonies, or reductions, or towns in which these moral victories were secured over savage wills and passions, were constructed upon the same plan. The dwellings of the inhabitants, or pupils, formed three sides of a square. These were, at first, mere hovels, consisting of a framework of stakes with stones between them, and then plastered over with mud and straw, very closely resembling many of those huts still used by our countrymen in the Highlands. The interior consisted of a single room twenty-four feet square, the door of which admitted light, and served as a chimney. These were erected and repaired by the community. To each couple or family was apportioned one containing a hammock, a few vessels of pottery or gourds, a chest or two, and a few benches. On the fourth side stood the place of worship, close to which were the priests' residences, public workshops, a separate house for widows—all enclosed within quadrangles, the burial ground, and a large garden containing medicinal as well as pot-herbs. The churches were described by those who conceived them to be desecrated by the purpose which they served, as the most spacious and splendid in that part of the world. Their windows of paper or talc shut out the fierce sun, but they glowed with gilding, and pictures, and sculpture, they were fragrant with flowers and sprinkled essences; and the symbols of Christianity spoke to the Indian in a language which even he could understand. The cemetery was, in anticipation of modern taste, planted and bordered with shrubs and flowers; and

* Dr. E. D. Clarke, *Travels in Europe, Asia, and Africa; History of Russia*, by Alph. Rabbe, &c.

the dust of the different sexes and ages slept separately in their appointed graves. There was, in a sense, a community of goods. The head of every family was allotted a portion of land whereon to raise maize, potatoes, cotton for himself, by the aid of oxen lent from the common stock. Of this he continued tenant so long as he was able to cultivate it. But at stated times each was called upon to labour in the Tupamba or God's possessions, the produce of which passed into the storehouse for the behoof of the infirm, the sick, of widows and orphans, and for public purposes. The corregidores, alcaldes, &c., by whom the municipal government of these townships was supposed to be carried on resembled that of Spanish towns, but in the missionaries resided the authority and administration; the machinery was ecclesiastical; every act was either dictated by or received its sanction from religion. Two priests, at least, regulated each community; one never left the scene of his labours, but passed from the altar to the workshop; the other, knowing intimately the language and habits of his children, a saint-errant, visited the out-field, gathered in new fruits, ministered to the sick or the sorrowful. Subordinate to these were trained Indian acolytes who watched over and reported the condition, mental, moral, and physical, of every inmate. Holy guilds or confraternities there were for mutual support and communion; that of St. Michael the Archangel for the men, the active, the laborious; that of the Mother of God for females, the pious, and the contemplative. Amusements there were, varied in character, but interpenetrated by the prevailing principles. The music was sacred; the dramas were of the Virgin, the Three Kings of Cologne; dancing was confined to the boys. The separation of the sexes was commenced in the cradle, was scrupulously enforced throughout life, except where intercourse was consecrated by marriage, and carried beyond death. Children were regarded as the property of the community, to be moulded, and made, and destined according to the will and model of their religious superiors. While the girls gathered and the women spun cotton, the boys made and mended roads, the men were engaged as masons, carpenters, turners, painters. They cast bells, built organs, and were most dexterous imitators of everything presented to them. Morning was hailed by prayers and mass; the day was divided as in monastic establishments, and each section marched to work in procession, headed by an image of St. Isidore, and chanting hymns and canticles. To labour and to pray were there the only duties and objects of life; and only such children as were designed for public offices were taught to read and write. There were punishments, but, according to the evidence of those who were at once teachers and judges, little crime; years passing without the commission of a deadly sin; restriction and retribu-

tion being, in all probability, directed to the confirmation of that inflexible routine, that implicit obedience, which were the characteristics and objects of monachism. Yet there survived generous and noble impulses under what is styled a benumbing influence. These artificial beings opposed the slave trade; they were roused by oppression and interference, defended their reductions, and repulsed the troops of Spain and Portugal. And yet, according to one who lingers lovingly upon some aspects of the system under which they were trained, an Indian was little more advanced at seventy than at seventeen. It may be that this vast organization became practicable on account of the simplicity, the intellectual weakness of its members; it may be that its power was exerted in producing or in perpetuating, while it used and directed, the feebleness and flexibility which it found. It is necessary to repeat that this episode in Christian history is no romance. Neither poet nor painter has added a colour to the picture. It is composed of traits and facts, in which perhaps the Jesuits saw nothing either beautiful or wondrous, nothing more than the cold, sharp outline of their duty, which existed a few generations back, which concerned hundreds of thousands of individuals, and which have left a few faint traces in their descendants. It matters little whether the experiment comprehended merely cannibal caciques and their savage tribes, or dispositions softened and prepared by an extinct civilization, the results would be equally demonstrative of the triumph of system over masses of untrained if not of untractable men, of the formation of a colony upon a basis in which material prosperity was a subordinate, moral benefit and intellectual development were the prominent considerations.*

III. Even when a noble cause is at stake, war and civil commotion loosen and break down the bonds by which society is coerced into industrious habits and regular proceedings, and call forth a class disposed to prolong the licence and the recklessness of the military life; to live upon the liberality or timidity of others rather than by their own exertions. It remains to be seen whether the spirit of modern civilization will, in time of social convulsion, prevent such a result, or force back at once such encroachments within their natural and prescribed limits. There was much simplicity and sameness in the remedies proposed in former times. On several occasions it was advocated that the multitudes of mendicants, and desperadoes, and idlers who remained, like the traces of a tempest, after peace and order had been so far restored, and armies disbanded, should be deported as slaves. This was actually carried into effect, and by an Englishman to boot, in the case of the thousands of youths and maidens

*. Southey's *History of Brazil*, *passim*.

assembled together on the shores of the Mediterranean by the epidemic madness called the children's crusade.*

We find the patriotic political economist, Fletcher of Saltoun, who recoiled from the defence of the country being intrusted to mercenary troops, describing vast numbers of vagrant and lawless and Godless poor, estimated at 200,000, who oppressed and terrified the peaceable and industrious inhabitants. These, or a larger portion of the able-bodied among them, he gravely recommends should be reduced to serfdom under such persons as would undertake to keep and employ them; or that, for example sake, they should be presented to the State of Venice to serve in the galleys against the common enemy of Christendom. At a conjuncture, after the last European war, when Holland was visited by a similar scourge of marauding mendicancy, philosophers suggested the milder expedient of forming agricultural colonies for the self-maintenance and the training of the poor, and this in a country where beggary and vagrancy are punishable by imprisonment. The principle upon which the hopes of the philanthropists who originated the enterprise, and of the great society which gathered around them, were founded, seems to have been that if the savage can, unaided, compel the earth to yield him sustenance, the indigent civilized man, under the guidance of science and experience, and supplied with capital and instruments, should be able to maintain himself and others. But the objects ultimately in view had a higher range, and comprehended the preservation in the minds of the donors of those feelings which entitle their gifts to be dignified with the name of charity; and the cultivation in the minds of the recipients of that independence and those habits of regularity and industry which are either incompatible with pauperism, or impart to poverty nobility and virtue. In carrying out this project, several thousands of acres of barren heath were purchased by means of the original subscriptions of the members of the society, upon which able-bodied beggars and paupers were settled with a view to reclaim and render them productive. The land was apportioned into lots of about seven acres, which it was calculated would support a family of six persons; who were offered a well-built house, education for their children, and medical aid, in return for about 142*l.*, to be advanced by the parish to which the colonists belonged, or from private resources, the payment to be spread over sixteen years, or until the original outlay had been refunded by the exertions of the settler, and until he had become self-supporting. It is germane to the present inquiry to notice that the house and buildings for a family of seven or eight individuals on each colonial farm cost

* Michaud, *History of the Crusades.*

about 42*l.*, the furniture and agricultural implements 8*l.*, and that it consisted of one public room fifteen feet by twelve feet, and of four closets, six and a half by six feet, apparently without windows, and sixteen feet in height. These habitations were built of brick made from clay found on the spot, floored with tile or brick, and roofed with reeds, and were placed at regular intervals on the sides of the broad roads by which the settlement is intersected. In 1825 the gross population amounted to 6778, distributed in eight establishments; 416 dwelling houses, six large depots for children and paupers, and 37 large farms and dependencies; 3227 were grouped together in families. The mortality appears to have been nine per cent. This experiment is most fully described in a work published in 1828, by a member of the Highland Society of Scotland, who pronounces it, so far as Fredericksoord is concerned, to have been completely successful.* In 1838 Mr. W. Chambers speaks of these colonies; and as keeping the streets of the Dutch towns free of mendicants and all sorts of disorderly persons.† A most interesting and masterly report, from the pen of Sir John M'Neil, appeared as an Appendix to the "Eighth Report of the Board of Supervision, 1853, on the Free and Pauper Colonies of Holland," and forms the most ample and authentic body of evidence upon the subject. From these observations it appears that not above sixteen or twenty colonists, or one per annum of the whole number, had been able to emancipate themselves during the thirty years past, by paying the debt due to the society, or the annual rent of 4*l.*; that independent tenants beyond the settlement pay the landlord 7*l.* or 8*l.* and live. It is calculated that the debt on each allocation amounts to 2352 florins; but if the improvement of the land be taken into consideration, the value of the house and then the deterioration of that, there would remain an uncovered balance of 800 florins, or 66*l.* 13*s.* 4*d.* against the society for each lot, equal to 2*l.* per annum since the commencement; and were the society to wind up its affairs, it would be found insolvent to the amount of 127,952*l.* It is further shown that each pauper costs the Dutch Government 6*l.* 13*s.* 4*d.* per annum, and this does not include interest on capital invested in land, implements, &c.; while in Great Britain the outlay is 5*l.*, in Scotland 4*l.*, on an average of seven years. There is, however, in the same document another and a more pleasing aspect of these communities presented. "When I," says Sir John M'Neil, "visited the colony in 1853, the whole 3000 acres, except some patches of wood, peat moss,

* *Account of the Poor Colonies and Agricultural Workhouses of the Benevolent Society of Holland*, by a Member of the Highland Society of Scotland.

† *Tour in Holland, the Countries on the Rhine, and Belgium, in the Autumn of 1838.*

and the roads and canals, were in regular tillage, the 420 houses, then occupied by the colonists, were clean and comfortable; the colonists were well fed, well clothed, and healthy; the schools and workshops in active operation; and that great sheet of cultivation studded with its neat cottages, inhabited by numerous families possessing so much of material well-being, like an oasis in the desert of stunted heath by which it is surrounded, was certainly a most attractive spectacle. Had I prosecuted my inquiries no further, I should have left Fredericksoord with the conviction that the scheme of free colonies had been completely successful, and that 420 families which had been a burden upon the benevolence of the community, had been transformed into a prosperous colony of small farmers, enjoying the reward of their industry in an amount of comfort exceeding that of the majority of their class in the same country.*—p. 6. For our present purpose it is not necessary to prosecute the inquiry further than the point to which this eloquent peroration leads.

The paragraph quoted appears to justify the conclusion that in Holland numbers of paupers of wandering habits and a low moral type may be provided with houses at the rate of 10*l.* per individual, maintained at a loss of about 10*s.* per individual per annum, taking a family as consisting of four, in the agricultural colonies, and though failing to maintain themselves, as was anticipated, they succeed in reclaiming extensive wastes, in assuming a regular and respectable deportment, and in making the desert blossom like the rose.

The most recent intelligence on this matter is contained in Murray's *Handbook* for 1856, where, after employing the facts, even the phrases supplied by Sir John M'Neil, it is observed, "though the attempt has not realized the sanguine wishes of its proprietors, nor is likely to do so, yet it has succeeded in the benevolent object at which it aimed, by rescuing many hundred individuals and families, previously paupers and friendless, from vice and destitution, making them useful members of society, and in rendering fertile and profitable large tracts of land previously desert and useless."†

It may be instructive to bring together some of the peculiarities by which these destitute and dangerous classes are distinguished, and to which are attributed, in part, the failure of the scheme for their redemption, as well as the special arrangements to which they are subjected; as approximating them in various degrees and at different points to the insane, and to the system which must be pursued when colonies of the insane are founded. They are

* *Eighth Report of Board of Supervision for the Relief of the Poor.* Edinburgh, 1853.

† Murray's *Handbook for Holland, Belgium, Prussia, &c.* 1856.

described as inept for agricultural occupations, as having a want of economical habits, as belonging to a race or class which, by want of energy and economy, has been reduced to indigence. But this propension becomes a hereditary taint, for the children of these men, though educated and improved in habits, cannot be taught industry, the spirit to maintain themselves, or to trust to their own exertions for a livelihood. It is asserted that so deficient is physical energy and strength in the race, that fifteen colonists are required to perform the field work of one good day-labourer. Subjected to a most minute and rigid code of regulations affecting their labour, time, the property committed to them, cleanliness, their moral and religious responsibility, to the violation of each of which penalties are attached; and watched and warded without ceasing; in order to economize supervision, and to secure the effects of example and co-operation, they work in gangs. Evasions occur, and each colony is surrounded by a wall or ditch, and no inmate is allowed egress without a written permission. But should these free colonists become indolent, refractory, incorrigible, they are transferred to a gigantic seclusion-house, where escape is impossible, and where punishments of a graver kind are inflicted.

There is in all these communities, widely separated as they are in other respects, a provision for the preservation of the family tie, under grave restrictions, it is true, and of the sacredness of home, within a guild or brotherhood, for the union of freedom within a limited range, with constant superintendence; there is the mingling together of the governing and the governed, yet the subjection to supreme authority, and the extinction of all individuality of purpose. These results have followed the training and isolation of sane but not altogether healthy or sound minds. In certain of these products may be observed what it is desirable to secure in any modified disposal of the confined insane. For the grand object is not classification, is not to promote greater activity in employment, or more remunerative efforts; it is not to rule by division, although all such justifiable ends may incidentally arise; but it is to introduce a new element, a new form of solace, and support, and happiness into the treatment of the insane—one which was unavoidably excluded from large communities and hospitals, but which seems necessary to the health of the individual, which is sought both to intensify joy, and in seasons of sickness, and sorrow, and despair. It has been long known that consentaneous action, confederation, conspiracy are almost unknown among the insane; that the formation of friendships, that intercourse, are indications of returning health, that they are likewise the means of accelerating convalescence, and, where that cannot be aimed at, of imparting to chronic and continued disease many

of the attributes of health. The groups, the cliques, formed in galleries, are suggestive of family life. Single rooms in asylums are not always places of seclusion for the noisy or contentious; but retreats, rewards for the reserved, the well-disposed, and which, under such management, so frequently assume the aspect of a private dwelling. In truth, the triumph of social reunions—of that part of moral management which brings different sexes, ranks, members labouring under different forms of alienation together for a common object, in one common pursuit or pastime, is but a step in the direction of establishing smaller communities, and of bringing each participator nearer into contact with the usages and feelings of his family and home.

“ The first sure symptom of a mind in health,
Is rest at heart and pleasure felt at home.”

It may be argued still further that chiefly where the internal arrangements of asylums most nearly approached the aspect and tone of domesticity, have they been most successful and beneficial in treatment; and that it has been the desire of all concerned in regulating the life of the docile and incurable insane to banish from their home equally the vastness of the American hotel; the iron bars, although they do not necessarily “a prison make;” the sickly sameness or the lugubrious paraphernalia of the infirmary, and the severe and parsimonious bareness of the workhouse; and by simple appliances, common furniture, and familiar objects, to reproduce what the mind has associated with its earlier and rational states, and with places and persons the recollection of which is calculated to withdraw it from its morbid and miserable self-analysis.

An asylum should assuredly neither be a prison nor a palace. Whether it contains one apartment or one hundred, a single inmate or a group, it should provide for safety without the iron aspect of security; and while affording that degree of comfort and those arrangements dictated by art which the mental condition of the patient demands, it should shut out splendour and ornamentation, which are incongruous to the object of an hospital or sanatorium, which may involve and conceal parsimony and error in other matters, and which, although remedies in certain cases, do not necessarily contribute to minister to the mind diseased. While space and air and light should be lavishly given, gargoyles and gilding, vestibules and grand staircases, may be doled out with a niggard hand. Nor is it absolutely necessary that a cottage should be Elizabethan, or lodge-like, or even in rigid keeping with the supposed picturesque, or rather that it should realize the ideas of the architect in the latter respect; as we know from high authority that with this quality much of the discomfort and squalor and sickness which are found in such residences may

often be associated even in England. Nor is it proposed that such residences should come under the category of cottages ornées ; a mansion house on a reduced scale, with books and busts and vases and verandas ; lilliput libraries and embellishments *à la* Tom Thumb ; but that they should possess, without the defects and vices, much of the homeliness of the houses to which the inmates were accustomed, and which they had learned to love and to use, and to which they must return. In fact, in order to secure perfect harmony between the early impressions of the inmates and their compulsory residence, it would be wise to exclude luxuries, and to introduce the time-honoured eight-day clock, the ambry, the wheel, the shelves of delf dishes, the domestic cat. Again, it would be absurd to convert these cottages into a means of training the occupants to the appreciation of a higher social condition, except in so far as the order and cleanliness, the mode of preparing the food, may incidentally lead to such a result, while it is securing, as it is intended to secure, the return of health.

In this inquiry there has been a tendency to confound the cottage system with that in which it is proposed to have a number of block-houses in place of one, an arrangement which it may either supplant, or be associated with. This division may be for the purpose of placing the sexes in distinct buildings, as in Pennsylvania ; or for the segregation of the convalescent, as at Illenau ; for the elimination of the agitated, as at Salpêtrière ; for the separation of the patrician and plebeian ; or for association in pursuits, as is attractively shown in the advertisement of the Colonie de St. James ; but whatever the motive, and however excellent the object, the arrangement is not that now proposed. It is a mere multiplication of asylums, and does not, and is not intended to secure that family life, that individualization, which is desired. These observations may be extended to the succursal dependencies in various institutions, to the pavillons at Vanvres, the chateaux at Brislington, the cottages at Aberdeen. They are detached portions of the asylum, but they do not differ from it ; in regulations, regimen, furniture, they are identical. With signal advantages peculiar to themselves, they do not realise the ideas of the domestic circle, the relations of parent and child, guardian and ward, host and boarder—not even master and servant ; nor of the frankpledge which has been attempted, and which might be so beneficially engrafted upon such communities. What, then, is a Cottage Asylum ? Definition should be avoided as well as dogma ; and even description should allow for amplification and development in the same direction. As at present contemplated, it is intended to convey the idea of an establishment in which, around or in connexion with a large hospital or sanatorium for certain classes of the insane, there shall be smaller buildings capable of containing families of which other classes shall form members ; all members

of the community being equally under the care and authority and constant supervision of a central medical staff. What is wanted is a village around a manor house. Vast parks and farms are not expected; and as the mere location in cottages will not increase the gross population of the asylum, the ordinary amount of ground, the ordinary proportion to each patient will suffice. But the inhabitants of this park hamlet must be entirely under moral control; an allegiance which can only be maintained by the limitation, not the abrogation of physical liberty, by sustained supervision, and the contact of a trained and trustworthy body of guardians.

The enormous outlay involved in the erection of modern asylums has suggested various economical expedients. It is natural that a maximum cost of 360*l.*, and a mean cost of 154*l.* for the accommodation of each patient, including land, should inspire alarm in the theorist, as well as in the ratepayer, and induce a reaction which has militated against the proper disposal of the insane. The effects have been even more disastrous than a mere preference for cheap structures and furnishings; as it has led to the adoption of a stereotyped form of building, recommended rather by the views of architects than by the experience of psychologists; and has afforded a pretext, in some parts of the country, for indefinitely delaying or declining the erection of Asylums at all. It is well ascertained that buildings possessing certain internal arrangements contribute greatly to promote the health and to facilitate the classification and the management of the inmates; but great differences of opinion still exist, and among the most competent judges, as to whether there be any one special arrangement deserving preference, or many, and some of these of the simplest character which is compatible with the objects in view. Nor is it yet demonstrated that the usefulness or manageability of a house is in proportion to the thousands lavished upon its ornamentation, nor even that the best plan may not be the cheapest. The famous Sonnenstein was anciently a castle where the redans and the redoubts were converted into day-rooms and dormitories, the glacis into gardens; if Bicêtre rose on the ruins of an Episcopal palace, Salpêtrière is a modified manufactory; the scene of Jacobi's labours at Siegburg and of Esquirol's at Charenton was a convent; and the most highly decorated asylum I have ever seen was a half-ruined resort for pilgrims in Bruges.

Although, perhaps, in Asylums, as in Governments, the best administered is best; an able executive sometimes bringing out splendid results from the most clumsy and unmalleable materials; an able and active and inventive mind compensating for the defects and inertia of stone and lime; yet it is of importance that improvements should be introduced into such structures, that the

requirements of science should be made compatible with as small an original expenditure as possible; reserving all extreme liberality for the treatment rather than the mere lodgement of the insane; but, leaving the discussion of the comparative merits of linear, or H plans, and of one or many distinct blockhouses to others, I would venture to take advantage of this difference of opinion, of this state of incubation or transition, in order to point to the erection of central houses of somewhat less gigantic dimensions, in conjunction with cottages, as one means by which the difficulty might be overcome and the expense avoided. Considering the simplicity of such a measure, and the ease with which it can be carried out, it being a provision which affords unlimited scope for addition and for gradual enlargement: and the fact that a large majority of the pauper and poor insane, in Scotland, at least, have resided, and do actually reside, in huts and hovels, and under circumstances more adverse than can be conceived to continue in any public institution; it is curious that no such plan has yet been tried nor suggested. The houses which have hitherto served as asylums, or places of detention, for one or two cases, are of the most primitive description. It is doubtful whether any innovation has crept in since the Roman invasion; and that then the type had been borrowed from other and earlier races; only that the plagiarism could not be detected in the perishable materials of which such habitations were formed. And yet these fragile tenements remain to tell their tale longer than could have been conceived. Esquimaux huts last, perhaps by the aid of congelation, for two hundred years, and mud-houses closely resembling those still found in Cambridgeshire are met with in South America three hundred years old. We have little concern with the fabrics, fondly named camps and castles, which have left nothing more than a faint outline of greensward on the hill-side, or with the ashes, and bones, and querns, which reveal a glimpse of their internal polity; but when, near some sepulchral cairn, are disclosed huge masses of granite thirty feet long and eight feet wide, the rough side out, and where these walls converge to the top as a substitute for an arch; or where we encounter on the slope of a glen, by the margin of a brook, beneath eight or ten feet of peat moss, oval passages of stone, about six feet in diameter, surrounded with the remains of pointed hazel stakes, or poles, the beams with which the walls were framed, we recognise the winter and summer dwellings, sometimes the villages of the true Caledonian peasant and poor of Dalriadic times, possessed at that time, perhaps, by the same class throughout Europe, and closely resembling some of those still occupied in remote districts and containing the insane.

Nor must these subterranean holes and wigwams, "that mole

and rabbit mode of society" as it has been designated, be complacently carried back to primeval savagedom, when insanity was not; for Sir Richard Colt Hoare, in his *Ancient Wiltshire*, says, "We have undoubted proofs, from history and from existing remains, that the earlier habitations were pits or slight elevations in the ground, covered and protected from the inclemency of the weather by boughs of trees and sods of turf."* Thomas Kirke, a Yorkshire squire, writing in 1679, when there was no Bedlam in Scotland, describes the gentlemen's houses "as generally of a fortified character, with strong iron grates before the windows, &c. The houses of the commonalty are very mean, mud wall and thatch the best. But the poorer sort live in such miserable huts as eye never beheld; men and women pig together in a poor mouse-hole of mud, heath, and such-like matter."† "Old men remember," writes Mr. Cosmo Innes, "when the dwelling of the Scotch peasant was not secure against wind or rain; with no window, or none made to open, with damp earth for floor, with dunghill and green pestilent pool at the door. The 'black hut' that is still to be seen in a few glens of the Highlands, is a less unhealthy abode than the houses of the yeomanry and peasantry of three-fourths of Scotland were half a century ago."‡ It requires no stretch of memory nor of fancy to realize this description. Such habitations still remain in thousands: they are accessible to the curious in mediæval architecture who yearly tread Iona and the West Coast; and they have been recently introduced to public notice in an authoritative document, and expressly on the ground that they are the "Cottage asylums" for large numbers of the insane poor.

"The Shetland cottage is usually built of undressed stone, with a cement of clay or turf. Over the rafters is laid a covering of turf, or sward, and above this again is a thatch of straw, bound down with ropes of heather, weighted at the end with stones, as a provision against the high winds which are so prevalent. Chimneys and windows are rarely seen. One or more large holes in the roof permit the escape of smoke, and at the same time admit light. Open doors, the thatched roof, and loose joinings, everywhere insure a certain ventilation."§ "Passing through the byre, the human habitation is reached." "Part of the house is used in winter as a privy."|| "There is a barrenness and desolation about the misery of a Harris house that is tenfold more depressing. It is a poor house and an empty one; a decaying,

* Quoted in Wilson's *Archæology and Prehistoric Annals of Scotland*. 1857.

† Chambers' *Domestic Annals of Scotland*, vol. ii. p. 407.

‡ *Scotland in the Middle Ages*, p. 318.

§ *Second Annual Report, Board of Lunacy, Scotland*, p. 214. 1860.

|| *Ibid.*

mouldy shell, without the pretence of a kernel.”* “The typical Lewis house is not simply a long unbroken range. It rather consists of a major block, of forty or fifty feet, with a small porch-like wing at one end in front, and a larger projection or attachment towards the other end behind, which last serves as a barn. Access to all is gained by one door. By this you enter the so-called porch, and on one hand you find that which is now seen in most antiquarian museums—the quern, not kept there as a curiosity, but as a regular fixture, and a thing for daily use. Opposite this is the stall for lambs and calves. As you pass from the porch to the major block, you first encounter the byre, and in summer, after the planting of the crops and the removal of the annual accumulation, you here descend a step: in early spring, however, you ascend. The cattle rarely leave the house during winter. On one side of the fireplace, supported on two pieces of turf or on two large stones, is a plank, which is the seat of the men of the household. On the other side is a rough three-legged stool for the wife. All sexes sleep together in the beds. The house itself is constructed of rough, unhewn stones; walls five or six feet thick, with an outer and inner facing of dry stonework, the intervening space being turf. The rafters do not overlap the wall, but terminate upon its inner edge, so that the rain falls from the roof into and not over the wall, which is therefore always damp. Walls six feet in height, and the door can only be entered by stooping. On the top of the wall, round the roof, there is often a footpath, on which children, sheep, dogs may be constantly seen. In one case, the public footpath to a neighbouring township of crofters led me over the end of one of these houses. There is no window; yet when the spirit of cleanliness, order, and industry enters it, comfort is then found where comfort seemed impossible.”

“It has been thought best to divide the habitations of the lunatics visited into two classes—the Saxon and the Celtic. The first is intended to include dwellings built of stone and lime, roofed with slates, floored with wood or pavement, having glazed windows, a chimney, and a fireplace, being generally divided into a ‘but and a ben,’ and sometimes having a garret or garrets between the ceiling and the roof. Of these there were thirty-nine entered. The second comprehends dwellings constructed of stone and mud, or more generally of sod; thatched with fern, or straw and mud, or covered with turf; having earthen floors, or these only partially paved with stones from the shore or the burn; where there are no chimneys; where the fire is in the centre of the single apartment which rises to the roof-tree, or is placed at the gable, and contained in or on a few stones, and where there are

* *Second Annual Report, Board of Lunacy, Scotland*, p. 214. 1860.

rarely glazed windows. Of these, constituting the lowest order of the black houses, costing about 8*l.*, 120 were entered. There are, however, hybrids between these classes, created generally by the introduction of some Saxon novelty, such as a grate or a chimney; and there are places and parishes where these rude arrangements are made consistent with a certain amount of cleanliness and comfort." "Although the following description applies to a Celtic house, it is not intended to serve as an example of the class, but as illustrative of dwellings provided for the insane poor, and in which they must continue to reside until they are removed to an hospital, or until the existence of such an establishment, and such high-class accommodation as it will afford, will suggest or compel a corresponding improvement in the circumstances of those who are allowed to remain at home." D. K., an idiot, with father, who is old and infirm, and a pauper. House a small hovel, built of moss sods cut from its site, or the surrounding almost unapproachable bog. The turf is built around a framework of hazel poles. Floor of spongy moss, except where some rough stones have been placed by occupant, who of course sits rent free in this ditch. All around is an unsafe quagmire, baked hard, it is alleged, by the sun; but during nine months soft and spongy, the position being selected in order to avoid expense. Four similar huts are close at hand, all inhabited by paupers, one of which, at least, was more wretched than that of K. Even were these cabins habitable, it is monstrous to place them where they are. K. has lived in his hut, or one on the same spot, for seven years. The interior is dark, damp, dirty; so small, that the reporter had difficulty in standing upright; so rude, as to remind him of the wigwam of the North American Indian.* A somewhat analogous but superior structure is seen in Cambridgeshire. "After a labourer has dug a sufficient quantity of clay for his purpose, he works it up with straw; he is then provided with a frame of eighteen inches in length, six deep, and from nine to twelve inches in diameter. In this frame he forms his lumps in the same manner that a brickmaker forms his bricks; they are then packed up to dry by the weather; this done, they are fit for use as a substitute for bricks. On laying the foundation of a cottage, a few layers of bricks are necessary to prevent the lumps from contracting damp from the earth. The fireplace is lined, and the oven built with bricks. I have known cottagers, where they could get a grant of land, erect a cottage of this description at a cost of from 15*l.* to 30*l.* I examined one containing two good lower rooms and a chamber, and which was neatly thatched with straw. It was a warm, firm, comfortable building, and might last for centuries."†

* *Third Annual Report, Board of Lunacy of Scotland.* 1861, *passim*.

† Denson's *Peasant's Voice*, p. 31, quoted pp. 178, 179. *A Practical Work on the Management of Small Farms*, by Feargus O'Connor, Esq. 1848.

These Celtic huts are open to condemnation for many reasons: but while some of these apply to the form, a far larger proportion are directed against the squalor, the misery, the discomfort which originate in the habits and tendencies of the race by which they are possessed. A Highland proprietor has offered to the writer as an explanation of the wretchedness of these places, that their demolition is determined upon, that the erection of such is discouraged, and a tacit premium set upon their extinction. But, forty years since, the superior many-roomed homesteads of this class were neither despised nor doomed; they were of larger size, they sheltered a more affluent and educated people, and gave tokens of tidiness, and taste, and elegance which have passed away. It is not gravely proposed to surround Asylums with such structures, with the genuine "Feigh Dhu;" but cottages such as experience has brought to be typical of the district, may be found to unite the requirements of seemliness and suitableness; and it is highly probable that in Highland scenes, where some of the projected Asylums must be located, a building of simple form, bold proportions, and rude materials, may be better in harmony with surrounding objects than those trim, painted toy-boxes which Walpole loved, Shenstone sung, and George Robins would have delighted to advertise. It may, however, furnish data as to the cost of huts in which lunatics actually live, and enlarge our views of the whole subject to state, on the authority of Dr. Howie, Ardnamurchan, that the lowest type described may be erected for 30s., or, if two apartments are provided, for 2*l.* or 4*l.*, according to the distance from which the turf may be cast and carried. In other parts of Argyllshire, where the walls are formed of stone without mortar, there is an outlay of 8*l.* 10s.; and, in order to show the practicability of such a feat, the estimate of a local architect is given, who, even in the decline and fall of those edifices, has built many.

	£	s.	d.
"For building	4	0	0
Eight dozen cabers, at 1s. 6 <i>d.</i>	0	12	0
Thatching	0	10	0
Two windows	0	10	0
Two couples	0	10	0
Four joists	0	4	0
Four dozen cabers	0	6	0
Ropes	0	2	0
Composition for floor	0	5	0
Two doors, 5s. each	0	10	0
Four days cart and horse	1	0	0

Total £8 9 0"

In the north of Inverness-shire the expense would amount to

10*l.*; and in the same district cottages of stone, pointed outside, flagged, provided with glass windows, with an open interior roof, and thatched with straw, cost from 20*l.* to 50*l.*, while in the central parishes of the same county, on a turf-dwelling of two apartments, and without window or chimney, 13*l.* will be expended; and on one of a superior kind, possessing these advantages, and a closet between the lateral rooms, 28*l.* All testimony goes to show that the time which such cots remain habitable depends, in great measure, upon the manner in which they are kept; that the presence of a chimney, flooring, and windows, place the pointed stone house nearly upon a par with the built stone house, and render it compatible with great cleanliness and neatness.

If, by a long stride, we pass to the town residence of the swart smith or miner in mineral districts, as black and cheerless as the shielings we have left upon the mountain, in dwellings of two rooms, measuring 16 feet by 11, exclusive of the two beds in each, which implies that they are intended to contain at least eight persons, we find that the mason work amounts to 37*l.*, the wright work to 34*l.*, plaster work, 4*l.* 10*s.*, and plumbing and slate work, 10*l.* 10*s.*—in all to 86*l.*, or 10*l.* 15*s.* per head; or, where they assume the name and capacity of double houses, and are supposed to be adapted to the reception of twelve persons, the gross outlay is 145*l.*, or 12*l.* per head. If we continue our search in Aberdeenshire, a most intelligent correspondent states that crofters, when they build for themselves, by dispensing with the loft or garret, as they involve joists and flooring, and by dint of great economy, get up a house, not counting their own labour, for about 30*l.* or 40*l.*; or, where an upper story or loft, a most essential element in our estimation, is added, from 60*l.* to 80*l.* This dwelling may easily, and comfortably, and decently contain five individuals; or, should we pass into the adjoining county of Elgin, another authority affirms that a cottage, thirty-six feet over walls, consisting of a good “but and ben,” flagged and floored, with garret or loft, and thatched with straw, would cost from 42*l.* to 45*l.* The walls inside would have one coat of plaster on the wall, no lath being used. The partition between the kitchen and room would get two coats of plaster. If the cottage were forty-two feet over walls, consisting of a kitchen, a closet, and room with a garret, flagged, floored, and thatched with straw, the cost would be from 45*l.* to 50*l.* If guided by our M’Cullochs and landscape painters, a thatched cottage forms an essential part of the picturesque. It is a “thing of beauty,” though not “a joy for ever,” as in some localities, and even when the material is pulled brechan, or fern-stalks, or heather, it requires renewal every seven years.

When we find that, even in England, in the fourteenth cen-

ture, gentlemen's houses were regarded as extraordinarily well provided for if containing three or four beds; that in Elizabeth's time cottages consisted only of a single room, and that chimneys, a discovery of which it is said Vitruvius had not a glimpse, were then introduced, we do not recoil so much from the present state of the dwellings of the poor on the extreme verge of our island.* Of the gradual progress of the English cottage to its present unsatisfactory state, little has been recorded. "Of the great body of the people, of those who held the plough, who tended the oxen, who toiled at the looms of Norwich, and squared the Portland stone for St. Paul's, very much cannot be said; history was too much occupied with courts and camps to spare a line for the hut of the peasant, or for the garret of the mechanic."† Nor are we surprised to discover that a century ago the mud-huts in Bedfordshire, like all others of their class, were huddled together, dirty, ill built, ill drained, imperfectly lighted and watered, and altogether so badly conditioned and unhealthy, as to be unfit for the residence of human beings. It is pleasing that the movement for the improvement of these houses of the labourer, which is about to culminate in a legislative enactment, began on this spot, and, by the direct act and exertions of the philanthropist, the prison-cleaner, John Howard.

In Devonshire stone cottages, containing two public rooms, 12×11 and 12×8 , and three bedrooms above, can be built for about 60*l.* The cob-house would cost somewhat less. From another trustworthy source we are assured that the wages of a farm labourer will seldom fairly admit of his paying a rent of more than 1*s.* per week, besides the value of the garden ground, if any. The lowest cost of building even a good four-roomed cottage is from 70*l.* to 80*l.*, according to the material; and the cheaper the building, of course more expensive and earlier repairs are involved. There is reason to fear, however, that such houses are of an inferior character as to internal arrangements, and that the cost is under-estimated; as Sir L. Palk, in moving the second reading of the Labourers' Cottages Bill, detailed cases of gross immorality resulting from overcrowding, which imperatively called for some legislative check. The object of this measure is to enable owners of estates to raise money, not exceeding 140*l.* per cottage, for the improvement of the cottages of labourers by a

* Hallam's *View of the State of Europe in the Middle Ages*, vol. iii.

† *The Dwellings of the Labouring Classes, their Arrangements and Construction, Illustrated by Reference to the Model Houses of the Society for Improving the Condition of the Labouring Classes.—The Model Cottages built by Windsor Royal Society*, by Henry Roberts, F.S.A., &c. Third Edition, 1853.—Dr. Watson Wemyss, *The Economic and Sanitary Improvement of Dwelling Houses for Agricultural Labourers*. 1860.

first charge on land.* We have not means of knowing the kind of dwelling which is proposed, nor whether the amount to which the charge is to be restricted may not be intended, and the intention is natural and justifiable, to render the building ornamental, or more in keeping with the domain, or the architecture of the mansion-house, of which it may be said to form a part. The originators and directors of so laudable an enterprise must be familiar with the following words:—"Fitness of style, justness of proportion, and internal comfort, are perfectly consistent with picturesque effect, and with that spirit of strict economy which is indispensable in cottage architecture for the masses of the people."†

In this country, however, many examples of cottages of a very superior description, and very similar to those which may be placed in connexion with asylums, and erected at a very moderate cost, exist. The following extract is from a newspaper in which this and congeneric topics have obtained a conspicuous and most useful attention:—

"In one block of cottages that we visited we found no less than five separate apartments—a kitchen with asphalte floor, a parlour boarded, a bed-room off the kitchen, with two beds, intended for the parents and the young children, and two small bedrooms off the parlour (each half the size of the one off the kitchen) for the use of the elder boys and girls. All the bedrooms are well lighted and ventilated—not only by means of the windows, which are so arranged in conjunction with the windows of the kitchen and parlour, that a fine draught of fresh air passes through them whenever the windows are put down, but also by ventilators in the ceilings connected with the outer air by a pipe passing up along the outside of the vents. Each of the cottages has a back door, more than half of which is of glass. This serves to light a commodious press and a scullery at the end of the passage. The bed-rooms have all fixed bedsteads, the kitchen and the parlour are provided with neat grates, and there are handy presses in both, with additional shelving for dishes in the kitchen. The kitchen and parlour are each about thirteen feet by twelve feet; each cottage measures thirty feet by twenty feet over all. The cottages are surrounded with a 'rone' to receive the rain water, which is collected in two large barrels, the site is well drained, each cottage has its necessary at the back, and, besides a garden behind, there is a neat little plot for flowers in front. The total cost of each cottage is stated to have been about 100*l*. Such cottages are of course uncommon, and many farmers declare, and facts bear them out in not a few instances, that ploughmen do not care to occupy more than one room. In the case of the cottages we have alluded to, however, the occupants appear fully to appreciate this excellence."‡

* *Times*, May 9, 1861.

† *Letter, Duke of Bedford to Earl of Chichester. Dwellings of Labouring Classes, &c. Windsor Royal Society.*

‡ *Scottish Farmer*, April, 1861.

Amid hundreds of others, I have visited and examined several of these in different localities, and with a special reference to the present inquiry; but in conveying some idea of their aspect, construction, and expense, I shall adhere literally to works in which they have been described by the proprietors or their representatives, and to whose philanthropy they are due. It is pertinent to these observations that in some of these groups were seen well-kept and happy pauper lunatics.

A square of houses was erected several years ago under the auspices of the Marquis of Breadalbane, on his property at Acharn on Loch Tay. All these are built of stone and slated, and obtained the unqualified approval of the Highland and Agricultural Society of Scotland as regards situation, drainage, substantiality of structure, internal accommodation, and outward appearance, and as, in every instance, showing the very marked improvement in the condition of the people induced by these commodious arrangements. The attractive exterior of these cottages might to many prove an objection. In one set there is one apartment on the ground-floor, measuring fifteen feet by ten feet, and two on the second, reached by a staircase, measuring respectively fifteen feet by eleven feet and fifteen feet by ten feet. In another set the arrangement is reversed, there being two rooms on the ground and one on the upper floor, the dimensions corresponding to those already given. These houses being built in blocks and of stories, secure a considerable saving in gables, roofing, &c. The entrances, however, and other arrangements, render them entirely distinct and private. The average cost appears to have been 65*l.* The total expense, including charge for excavations, pavements, zinc windows, grates, common to all, was 986*l.* 19*s.* 7*d.*, but deducting from this contracts for offices, the outlay amounted to 844*l.* 5*s.* 5*d.*, which divided over fifteen cottages, gives the average stated above, 65*l.* 16*s.*; but by dividing the cost of the offices and the contingencies over the whole equally, we have, for out-of-door offices, about 17*l.* 4*s.* to each cottage, and this added to the cost of one cottage of each class, gives a total of 56*l.* 8*s.* for each cottage of two apartments, or, taking the family at four individuals, though there were actually a larger number of inmates, 14*l.* 2*s.* per individual, and of 86*l.* for those of three apartments and offices, or 21*l.* 10*s.* per individual. It will be obvious, however, that it is for the price of such cottages *exclusive* of the outlay for offices that we have to deal.

About thirty years ago, J. J. Hope Johnstone, Esq., of Annandale, M.P. for Dumfriesshire, adopted the plan of granting to cotters, tradesmen, and hired servants of good conduct, a lease of twenty-one years of the house-stead and large garden at a rent of 5*l.* The tenant erects the house at his own expense, excepting the price of timber, which is given from the estate, and hewn free-

stone for chimney heads, door and window rybots, jambs, &c., in all costing the proprietor from 5*l.* to 6*l.* The cost in 1844 was—

Welsh slates	. . . . .	£4	10	0
Mason and slater	. . . . .	5	10	0
Joiner, and windows, two in front and				
one or two in gables	. . . . .	7	0	0
Price of lime, and other outlays	. . . . .	4	0	0
<hr/>				
		£21	0	0

In 1859, from the higher rate of tradesmen's wages and better finishing, this cost may have increased to 30*l.* or 35*l.* Any additional cost is confined to the tenant's own work, in raising and finding stones, assisting masons and carriages which, in most cases, they get in kindly exchange for farm work to farmers and neighbours. I have lately seen in two asylums mason and carpenter work to a considerable extent executed by patients and in a creditable manner, so that a slight saving might be expected in the erection of cottage asylums, while employment of a novel description would be afforded to those who might benefit by their own handiwork.

The smallest house is generally thirty feet long by nineteen feet wide over walls. Those most recently erected are higher, the under floors and lofts are boarded, the room-end occasionally stoothed and papered. It must be admitted, however, there is still too much crowding, with less ventilation and fewer conveniences than are desirable. The early drafts upon the family by the departure of children into service; and the invariable practice of leaving the doors open, and in a manner living in the open air, in part compensates for these disadvantages: but the radical remedy would consist in restricting the number of inhabitants. These houses, about seventy in number, are in general placed in single dwellings along twenty miles of turnpike or parish roads, whitewashed, comfortable, and clean in appearance. Many of the original leases have now expired, but few changes have occurred. The results have been most satisfactory, as might have been expected from the security of tenure, the regard had to the respectability of the leaseholder, and the constant supply of labour.

The aspect and situation of these dwellings differs so much as to diversify and beautify the country. The interior is likewise variously arranged, the number of rooms corresponding (within certain limits) to the size and wants of the family; and their position, although a general principle may be seen to run through the whole, being regulated by other objects. The first of about twenty entered was occupied by nine individuals. In some re-

spects it realized that architectural *summum bonum*, a rectangular building; contained three rooms, two of which measured thirteen feet by thirteen, feet and eight feet in height, having fireplaces; and garrets of good size and provided with skylights, which were unoccupied, but might have accommodated several additional inmates. The second, where the family consisted of six and a servant, had three rooms, a shop, and offices; the passages were paved, the rooms boarded. In the public department there were two windows, in the others one. The form in this instance was that of a main block with receding wings. The third, and this presented the most common type, had two apartments and a closet behind communicating with the kitchen; and lofts, which were not, however, converted to any use. In this the anathematized box beds had disappeared, and recesses substituted, built in the wall, which was plastered over stone and lime. Considerable improvement had been recently introduced into this cottage; the original floor of clay and rough stones had given place to planking, the walls were papered, and by the aid of a blooming garden in front, and rigid cleanliness and tasteful contrivances within, the observer was led away from brick and mortar to romance. But in the next, built about twenty-six years ago, which was complained of as cold and damp, and stood as it had been placed, embowered in trees, with an uneven pavement of stones and flags, and a roof of the same material, there were found three rooms, two with fireplaces; the lofts being convertible into garrets, but of difficult access; the whole capable, the occupant was confident, of receiving eight or nine inmates, and undoubtedly of separating or properly dividing five or six. Were it obligatory to transplant Gheel to this country, it should be placed in Annandale, where plain but comfortable houses, capable assuredly of improvement; where substantial prosperity, a smiling and apparently happy valley, and a respectable if not a pattern peasantry, offer greater encouragements for such an experiment than can easily be met combined elsewhere.

I am prepared, but not disposed, to append either plans or precepts for guidance in the modification of such dwellings as have been adverted to, or in the construction of succursal cottages upon a more suitable principle. There is nothing complicated, nor recondite, nor special required. If plans either in verification of what has been advanced, or in furtherance of the project advocated are sought for, they will be found in the *Model Cottages built by the Royal Windsor Society*, the *Transactions of the Highland and Agricultural Society of Scotland*, *Annual Reports of Association for promoting Improvements in the Dwellings, &c. of Agricultural Labourers in Scotland*, &c., furnished for a different but equally laudable purpose; drawn by architects of eminence, sanctioned by

practical men, and recommended upon moral as well as upon economical grounds, and, in one instance, after having been tested by occupation for a quarter of a century. If directions were craved they might be supplied from the noble words of the present Prime Minister of England, who, after proclaiming that proprietors and tenants in affording accommodation for the agricultural labourers must not look too much to receiving a per-centage in the shape of rent; that it was only by promoting the comfort, health, and decency of this class that they could obtain the full value of agricultural possessions, added, "these cottages should have at least three sleeping rooms, one for the heads of the family, one for the males, and one for the females," and he might have safely added a window and a fireplace in each room. Dr. Conolly, in commenting upon the objections to the expense of county asylums, said long since, but for all time, that the benevolent consideration which is so cheerfully given in all Christian countries to the sick poor who are not insane, ought, at least, to be as freely extended to those labouring under sickness and infirmity of mind;* and it should be accepted as a corollary from this sentiment, that nothing sordid, nor paltry, nor penurious should, upon the mere score of saving, enter into the contemplated arrangements. But simplicity and order are in themselves beautiful. If anything be lost in decoration, there will be unequivocal gain in greater freedom, in the liberty of privacy, in living in their own house or room, fresh air, and sunshine. The central infirmary should, in relation to its special purposes, be superior and more commodious than ordinary dwellings; but it is conceived that some similarity should exist between the cottage within the precincts of the asylum and those without; and these brief notices have been accumulated to show how small the additions required in order greatly to surpass the original home, in order to accomplish the object in view; to explain how simple the elements are which we are called upon to work into a suitable form; and to contrast the circumstances in which the lunatics have lived, with those to which they must be transferred.

But connexion with such cottages does not alienate the lodger from the house of reunion. His privileges, many of his pursuits, his amusements, his meals will be accessible only under the spacious domes and arcades, if such there be, which shelter other classes of the community; while, superadded to these, are the quiet domestic life and engagements which are secured in his special dwelling. The opinion that family life may be created amid the crowds in a public asylum has been adventured by a French psychologist; but apparently in ignorance of what such

* *Construction of Asylums.*

communion imports; or, at all events, of what it means in this country, and of what is practicable in our asylums. If cottages, however, of the kind described, can be provided for labourers and artisans, the members of whose families are, or may be, numerous, and of different ages, where the arrangements must necessarily be complicated, it is obvious that the simplicity of the relation between one or two or three females and a mistress, or dame or associate, or between the same number of males and an attendant and his wife, will render the provisions for sleeping accommodation easy, especially as during sickness an immediate removal will take place; will place a large amount of space at the disposal of the guardians, and reduce the cost of accommodation per head nearly as low as if the patients were located in a turf or mud-house. In so far as this latter object can be effected, without infringing upon individual treatment and enjoyments, in fact, upon the rights of the inmates, the sphere of usefulness will be widened by affording opportunities for increasing the numbers of the general population.

I am not engaged in solving the problem of providing cheap accommodation for the insane. I think, however, that a conceivable argument against cottage provision is removed by demonstrating that dwellings have been erected and long used for sums of 60*l.* and 35*l.* These houses were intended for the class from which the inmates of asylums for the indigent may be expected to be supplied. They contain two or more rooms, sufficiently spacious for a family of six persons; of a construction susceptible of being heated, ventilated, kept clean; of having Pompeian hollow bricks in the walls, of being laid with tile pipes and broken stones and drains, and in which the inhabitants have possessed an average amount of bodily health and vigour. If in the smaller one, and in the larger of these permanent homes two rooms were set apart as dormitories, or if the patients passed the night in the same chamber with their attendant, a practice not inconsistent with the established customs of this country nor with those prevalent in all asylums, they would be lodged at a cost as yet unprecedented and even undreamed of by the most sanguine speculators. It does not appear that any peculiarity should be introduced into cottages, built according to sound principles and found to be comfortable. Any speciality would make them unhomelike. The class selected for incorporation with the attendants or dependants and their families would be to a certain extent trustworthy; the sense of responsibility would grow by being trusted; personal supervision and the parole of all for the integrity of each must compensate for defective honour and prudence, so that additional means of security may reasonably be dispensed with. But should it be deemed beneficial to add to

the size of these dwellings, or to render them more ornate, more pleasing to the eye, though perhaps less like a cottage, these objects can be secured by a comparatively small additional expenditure; and even were the outlay doubled it would fall short of what has hitherto been entailed in providing accommodation for the insane. Objections exist to any great enlargement for the purpose of assembling together numbers of the insane, and the chief of these is, that it is fatal to the principle of domesticity and privacy which should underlie the whole enterprise. Nothing should dis sever the tie between the recluse and the great body of which he forms a part, between the patient and the physician, and the means he employs to regulate the health, but the tie may be loosened and lengthened, or supplied by higher motives; but if these houses become merely retiring and sleeping places for companies of eight or ten, such as are associated under ordinary circumstances, they may be commendable on the ground of easy ventilation and quiet, but, morally, they will differ very little from the small and vicious, and vicious because small, dormitories in a block-house.

But there are other considerations worthy of note. In the manner proposed, ten, twenty, an indefinite number of patients might be withdrawn from the crowded galleries, from the Maelstrom of turbulent passions. This is not merely a gain of space. It is a gain in three ways; by relieving from the pernicious effects arising from the close and constant contact of unhealthy and therefore antagonistic natures; by facilitating management; and by protecting sensitive, and impressionable, and excitable minds from the influence of the more energetic. It is not proposed that such separation should be general, as the converse of some of these propositions may in some cases be urged, for if the calm become excitable by associating with the excitable, the excitable become calm by mingling with the calm; but within limits, the opportunity of even temporarily relieving the pressure which must, less or more, obtain in all large establishments by the removal of certain classes to separate buildings would be invaluable. It would, among other effects, greatly diminish the necessity for seclusion of the violent, which is resorted to nearly as often for the interest of those around as for their own. There would be provided an object of ambition to be sought, striven, lived for. It is the claim and cry of many an inmate of a refractory ward, and it is hard to reject the petitioner, not for freedom, but to be removed from noisy, noisome, profane, dangerous companions, to some less frightful, some tranquil gallery. It is as often the craving of the calm and chronic for the society of the sane, for one breath of the "free, fresh breeze on mountain playing," for a brief indulgence of the sense of emancipation. It may appear

overstraining the argument to pursue the benefit of the cottage system to its effects upon those for whom it is not designed, or to affirm that such a system would reach every inmate cognisant of its existence; but that the recognition of being almost, if not altogether, unworthy of bonds, involved in the act of transference from seclusion to a home, must operate curatively and beneficially upon all to whom it may ultimately apply, does not admit of question.

The distribution of such houses is not immaterial. It is not necessary that they should be marshalled into a parallelogram like a Spanish reduction, nor planted at measured distances along avenues like a Dutch colony; nor be isolated and surrounded with means of coercion or protection like a military settlement; yet regularity in arrangement, facility of supervision, and security, should all be cared for. As, however, two or more of them will serve as entrance lodges; as others may be the residences of gardeners, joiners, storekeepers, the position of a number must be determined by convenience, and of others by the nature of the site and by the extent of the grounds or farm, and, necessarily, by the conceptions of fitness entertained by Boards of Direction and builders. Such dwellings may be regarded as paying rent. If a celibate or a married couple, who it would be reasonable, or as reasonable as in similar combinations, to demand should be childless, be entrusted with such a section, it is fair that the extra duty, for such it can be held to be, should be compensated for by the superior kind of accommodation afforded; while the provision of a house at all must form an important part of the wages agreed upon. Although it may be legitimately objected to the presence of children, that they will fill up and exhaust the affections of the guardians and dwarf their exertions, to exclude them in all cases would be to monasticise and chill the group. I have entrusted children, and my own, to almost all classes of the insane, as a remedy and consolation, and have seen lunatics nursing infants who had the strange fate of being born in a padded room; and far from prohibiting, would prescribe the widow with children, or the unbroken family, as a nucleus for a certain number of cases.

By the respectable class of attendants such an arrangement would be regarded as an inestimable boon, and in the case of all others the withdrawal of temptation, the check, the control, the moral influence exercised by residence within the precincts, would repay a hundred-fold even a lavish outlay, were such necessary; for every superintendent knows that the liberty day, the liberty hour, the temporary absence, the evening visit to town, or family, are fraught with dangers and difficulties to both sexes, which rarely present themselves under discipline, and which recoil upon the happiness and reputation of the body to which the

offenders are attached. The existence of such homes, and the advantages which they secure, would serve as an inducement to a superior class of candidates; and have been suggested and in some instances supplied with this object, where the more direct interests of the patients were not considered. The expediency of multiplying such guards and guarantees for human virtue is supported by the fact that from the ordinary constituents of the population there can be selected, after repeated trials, competent custodiers is not so certain as is supposed. Various tests of eligibility have been proposed and applied—education, particular professions, temperance or abstinence pledges, marriage, membership with the church to which the applicants belong, but all these have proved abortive or inadequate. It is not merely with the antecedents, it is with the capacities of the candidate that we have to deal. So naturally does the suspicion arise that deterioration is induced by long-continued exposure to contact with unhealthy minds, that two learned friends, Brierre de Boismont in 1854, and Dr. Sibbald during the present year, have instituted an inquiry into the ratio of mental diseases to the indigenous population of Gheel. It is certainly something to be bullet-proof. It is not enough, however, in such a grave matter, to prove, had success attended the attempt, that these Gheeloises were not more affected with insanity than their compatriots, who are merely clod compellers. There may be a worse effect than madness produced in the guardians of the insane by the performance of their duties. They may become irritable, hebeté, callous, criminal. The notion that attendants become ill from infection, or imitation, or sympathy, is all but exploded; but the less extravagant insinuation that, apart from the effects of age and the tear and wear of anxiety, the mental and moral powers are taxed and ultimately suffer in this department of medicine, few will be found to doubt. But the thesis as to the Belgian peasantry is that they become *better*, that their habits of thought, almost their training and experience, are *transmissible*. But on looking at the soil from which these results spring, there are no reasons to discourage us in our present enterprise, as it appears that the means of education are nearly the same in both countries;* and that “il se trouve que la loi du développement du penchant au crime est la même pour la France, pour la Belgique, pour la Grand Duché de Bade, et pour l’Angleterre, les seuls pays dont les observations soient bien connus.”†

* *Ducpetiaux on Penitentiary Reform*, p. 80, vol. iii. 1838. *Quarterly Journal of the Statistical Society of London*.

† *Sur la Statistique morale, et les principes qui soient en former la base. Par Ad. Quetelet. Dec. 1846. Mem. de l’Académie Royale de Belgique.* xxi., p. 99. 1848.

If individuals or small groups—and they should be as small as possible—join their associates at the public dinner, for the influence of society must not be superseded by the claims of segregation, and be accompanied by their matron or guardian, the kitchen arrangements and duties become occasional and slight; and if the industrial part of the population should be transferred to the single houses, and continued their trades in workshops, or in the fields, their homes would more and more resemble that of the husbandman, which is deserted, ventilated, cleaned, and set in order during the day, and occupied, lighted, heated, attractive before and after the hours of labour and activity. Or, should the aged and infirm, the dreamy monomaniac or the hopeful convalescent, prefer the quiet or busy circle round the kitchen fire to the large assemblies in the central house, there seems to be no good reason for disturbing what is a legitimate and pleasing part of the peasant's family life. The experience of attendants will secure a higher style of order and embellishment than what exists in an ordinary cottage; for training, if it avails in nothing else, is equivalent to the appreciation of refinement in habits and manners, of personal neatness and tidiness, and to a knowledge of what comfort is.

These and similar details will naturally fall to be determined according to the views of the medical superintendent in each particular case. A very interesting table is given by Dr. Sibbald, in a paper upon the Cottage System and Gheel,* with a view to show approximately the number of patients out of 603 then in the Asylum at Morningside that might be regarded as suitable for a cottage, or suitable for a detached building, and the results are important, but involve considerations which cannot be entered upon here. It is likewise necessary to avoid the discussion of the advantages which might accrue from many such cottages as places of observation, and for the reception of certain classes of cases from without, or from extending the system to the affluent, who might continue in the bosom of their family while under the treatment of experts, and under that discipline which is found to be so powerful an adjuvant to physical means; or from seeking, in the opportunities for classification and minute subdivision which it affords, an escape from some of the difficulties which obstruct the introduction of individuals labouring under dipsomania, puerperal mania, and other forms of transitory mental disease within the outer cordon of a sanatorium.

The Journal of Mental Science, April, 1861, p. 57.

ART. XII.—MEDICAL GOSSIP.

THE little "difficulty" between the Apothecaries' Society and the College of Physicians has at length been brought to the arbitrament of the law. In the course of the past quarter the question of the right of the College of Physicians to form a new order of licentiates, who might practise pharmacy, was brought before Vice-Chancellor Sir W. P. Wood. On the part of the Society of Apothecaries it was urged, that the Medical Act of 1858 recognised and assigned to each branch of the profession its distinct powers and sphere of action, and that it was a fraud upon that statute for the College of Physicians to create, in violation of their own by-laws, a new body of practitioners altogether unknown in the profession, and, so to speak, of an "epicene" order, partly physicians, partly apothecaries. The rights of the apothecaries, it was said, which had been secured to them by the Act of 1815, would be seriously invaded if the College were permitted to carry out its design. Moreover, it was important upon grounds of general policy that the College should be restrained from so doing, lest the public should be flooded with unqualified men, whose ignorance in the proper dispensing of medicines might occasion serious harm. It was essential therefore to the public welfare, the ancient dignity of the College, the authority and privileges of apothecaries, and the maintenance in their integrity of the provisions of the Legislature, that the Court should interpose to prevent this unauthorized attempt by the College of Physicians to do that which was not only *ultra vires*, but would go far to destroy the rank and position enjoyed by the College for more than three centuries.

Notwithstanding this pathetic appeal, in which the Society of Apothecaries manifested not merely a due care for its own welfare, but also a greater care for the dignity of the College of Physicians than that College had thought fit to show for itself, the Court manifested a complete insensibility to the considerations urged upon it by the appellants. The Vice-Chancellor held that their arguments were of no weight, and that in respect of the matter complained of, the College of Physicians must be left to its own devices.

He said, that in order to support the argument that the creation of a new order of licentiates by the College was a fraud upon the Medical Act of 1858, it would be necessary to assume that the *status* of licentiate was definitely fixed, and must now, after the

passing of that Act, be taken as stereotyped and bound for ever by the former conditions and restrictions. But what were the conditions imposed by the by-laws of the College? They might be divided into two classes—conditions precedent, as to the capacity and education, &c. of the candidates; and conditions subsequent, as to the compliance with the by-laws (restricting the vending of drugs, &c.) after receiving the licence. In one sense this prohibition was a condition precedent, but it would be more convenient to treat it as a condition subsequent. What evidence, then, he asked, was there that these conditions were to remain unalterably fixed, as contended for by the Apothecaries' Society? On the face of the Medical Act there was nothing to that effect—nothing to restrict the by-laws to their existing state. How could it be contended that the College of Physicians were not to have full power to modify, from time to time, the qualifications required for admission into their body, with the control of the general council? The only point on which the Legislature interfered in this respect was that particular theories—such as homœopathy, mesmerism, and the like—were not to act as disqualifications. Even assuming that the College was precluded by the Act from relaxing its conditions subsequent, he was by no means sure that this would be sufficient to sustain the bill, or that the licences granted by the College must not be left to be tested at their worth in a court of law. The real question was how far the design of the defendants was a fraud upon the Legislature, and how far they were precluded from altering their own by-laws. Their original charter admitted the whole domain of physic within its purview. Not only “*physic*,” but surgery was included, and its effect was to throw the universal medical science under the control of the College of Physicians. Up to the 15th of James I. no one could have disputed the right of the College to deal with the question of selling medicines, and to revoke any by-laws made by them upon the subject. It might be observed that the very existence of such a by-law implied that it would have been the custom of physicians to deal in drugs but for such a restriction. No doubt, considerable inconvenience was occasioned to the public from the restriction, and this gave rise to the apothecaries and their incorporation by James I. The apothecaries, from the very humble position of grocers and mere drug-sellers, gradually acquired greater knowledge as to the properties of drugs, and skill in their administration. They were accordingly incorporated by charter from James I., with certain privileges to themselves and restrictions against others. It could not be maintained for an instant that this charter had in any way interfered with the privileges of the College of Physicians granted by charter and confirmed by statute. From the time of Henry VIII. down to 1815 it was not possible to

suggest a doubt that the College might have relaxed any of their by-laws, including that which restricted the sale of drugs. Then came the Apothecaries' Act of 1815. It was contended that the saving clause (sec. 29) did not preserve to the College the right, which existed before the Act, of granting licences to practise physic divested of the restriction contained in their by-laws. To say the least, the matter was far too doubtful to induce the Court to restrain a public body acting *bonâ fide* and in the belief that they were not exceeding their functions, nor was it clear that that Court was the medium through which a solution of the question could be properly obtained. The Vice-Chancellor then adverted to the case of surgeons dispensing medicines and recovering for them. There was no express repeal of the privileges of the College of Physicians, but on the contrary, an express saving, and unless the two things were so absolutely inconsistent that one of them must of necessity be excluded, he could not come to the conclusion that the privileges vested in the College were abrogated by section 20 of the Apothecaries' Act (imposing a penalty of 20*l.* upon any one acting or practising as an apothecary without the licence of the Society). The Vice-Chancellor, after some further observations, proceeded to consider the Medical Act of 1858. It had been contended that as the Legislature must have been aware of the previous *status* of licentiates, the creation of a new body of licentiates would be a fraud upon the Act. But until 1858 it was clear that the College had full power to create that new body, and if it were necessary to determine the question upon this ground, he thought that the Act of that year did not abrogate such right. There was not a *scintilla* of evidence on the face of the Act of an intention to deprive any one of the medical bodies of their power to alter their by-laws, so long as they kept within the limits of their charter. If he were to import into the case the knowledge possessed by the Legislature, all that could be assumed would be a knowledge of the exact state of things then existing; and Parliament must be taken to have known that by-laws could always be altered by the bodies who had made them. The Vice-Chancellor then referred to the preamble in support of his view, that there was nothing in the Act to abrogate the powers existing in the several medical bodies. The only grievance alleged in the information was that the defendants were elevating the old licentiates into members of the foundation, as it were, and creating a new body inferior in qualifications to the former. The question, however, returned to this:—Had the defendants authority to do this act? The information did not state that this new body would be apothecaries, but “to some extent a class of apothecaries.” In his view of the case no possible amendment would help the information. Assuming, for the moment, that the plaintiffs would

have a right of action against these new licentiates, who took their licences with knowledge of the Act of 1815, still the College of Physicians would not degrade their licentiates for selling drugs, and the worst that would happen would be that they might have to obtain the certificate from the Society of Apothecaries. As to the argument of public injury arising from the harm done to these young men who accepted the licences from the College, and were consequently deceived, he confessed that he did not attribute much weight to it. The legal maxim, "*Volenti non fit injuria*," would apply to such a case. In conclusion there was not a shadow of a pretence for saying that down to 1815 the privileges originally conferred upon the College of Physicians had been in any way abrogated. The Act of 1815 did not, in his opinion, prevent the College from altering their by-laws, and clearly the Act of 1858 had not that effect, so long as they kept within the limits of their charter. Upon these grounds the case of the Society of Apothecaries must fall to the ground.

Whether the apothecaries will try their case at common law remains to be seen, but the lot that has thus far befallen them in the present conjuncture ought, we would suggest, to have a moral for the College of Surgeons. What if that worthy corporation should not amend such of its ways as are open to reprehension, the College of Physicians should step in and claim its right of making surgeons? The statute 32 Henry VIII. is sufficiently precise upon this point. "And forasmuch," we read, "as the science of Physick doth comprehend, include, and contain the knowledge of Surgery, as a special member of the same, Therefore be it enacted, That any of the said Company or Fellowship of Physicians, being able, chosen, and admitted by the said President and Fellowship of Physicians, may from time to time, as well within the City of *London*, as elsewhere within the Realm, practise and exercise the said science of Physick in all and every his members and parts; any Act, Statute, or Provisions made to the contrary notwithstanding."

In May, 1860, the Council of the Royal Medical and Chirurgical Society appointed a committee "for the purpose of conferring with some of the Medical Societies of London, on the subject of a proposition for uniting in one comprehensive body the various Societies engaged in the prosecution of separate departments of Medical Science." The Presidents of the Epidemiological, Pathological, and Obstetrical Societies were communicated with, and the councils of those societies immediately appointed committees to take the subject mooted into consideration, in conjunction with the committee appointed by the Medico-Chirurgical Society.

The last-named society was represented by Mr. Skey, the presi-

dent; Dr. Williams, and Mr. Spencer Smith, vice-presidents; Mr. Alexander Shaw, the treasurer; Mr. Hawkins, and the secretaries, Dr. Barclay and Mr. C. H. Moore. The Epidemiological, by Dr. Babington, the president; Dr. Milroy, Mr. J. F. Marson, and the secretary, Dr. MacWilliam. The Pathological, by Mr. Fergusson, the president; Dr. Murchison, and the secretaries, Dr. Ogle and Mr. Henry Thompson. The Obstetrical, by Dr. Rigby, the president; Dr. Tyler Smith, and the secretaries, Dr. Graily Hewitt and Dr. Tanner. The united committee, at its first meeting, resolved unanimously—

“That it is the opinion of this Meeting that it would tend to the advancement of Medical Science were the Royal Medical and Chirurgical, the Pathological, the Epidemiological, and the Obstetrical Societies united under one head, and these different branches of Medical Science carried out in corresponding sections of one Society.”

Subsequently the following scheme was also agreed to by the United Committee:—

I.—That the united Society be divided into the following Sections :

1. Practical Medicine and Surgery.
2. Pathology and Morbid Anatomy.
3. Epidemiology and Hygienics.
4. Obstetrics and Diseases of Women and Children.
5. Physiology (including Anatomy and Animal Chemistry).
6. Psychological Medicine.
7. Medical Jurisprudence.

II.—That the Treasurers of each Section respectively receive the subscriptions to such Section, and defray from their own funds the expense of publishing their Transactions, and other necessary outlay. That the surplus, if any, be paid into the General Fund, and any deficiency be supplied from that fund.

III.—That Fellows of the Royal Medical and Chirurgical Society [*i.e.* of the Society when combined] be Members of all the Sections, and have a right to attend all Meetings of such Sections.

IV.—That persons, not Fellows of the Society, be admitted Members of any particular Section on payment of an annual sum, and be designated Members of such Section, and Associates of the Royal Medical and Chirurgical Society [*i.e.* the Societies when combined].

V.—That each Section elect annually a President and other officers for the management of the affairs of its own department, and also from time to time elect Members who are not Fellows of the Society.

VI.—That in the annual nomination of Fellows recommended by the Council for election as President and Council of the united Society for the ensuing year, two at the least be selected from

among the Members of Committee of Management of each of the several Sections.

VII.—That Members of particular Sections have the right to attend all meetings of such Section, and to be admitted to the use of the Reading-room, but not to remove from the Library any books, except such as belong to the Section.

VIII.—That it be the business of the Committee of each Section to prepare a report of the proceedings of the past Session, to be read at an Annual Meeting to be held for that purpose.

On the 5th April, a special meeting of the Medico-Chirurgical Society, by a majority of 38 against 23, affirmed the resolution, that the amalgamation of the different societies would prove advantageous to medical science; and subsequently the Epidemiological Society came to the same conclusion. The Obstetrical and Pathological Societies, it is understood, dissent from the resolution.

The promoters of the scheme for amalgamation appear to hold that the union would not only give an impetus to and promote in several ways the advancement of medical science, but also that the combined society would worthily represent English scientific medicine, as well with the public as the profession, and both at home and abroad—opinions in which we heartily concur. The recalcitrancy of the two last-named Societies must, we fear, prove fatal to the scheme.

It has usually been the practice when an active dissidence of opinion has taken place between any two practitioners in consultation upon a case, whether the dissidence arose upon a question of diagnosis or of treatment, for one to retire from the case. The practice was consistent with common sense; and indeed, the very supposition of a continuation of consultations under such circumstances, professedly for the welfare of the patient, involves an absurdity of the most glaring description. It never occurred to orthodox medical practitioners that, in adopting this line of conduct, they were necessarily guilty of disrespect to patients or friends; and, on the other hand, it seemed pretty apparent that to adopt an opposite course would be to countenance a somewhat discreditable sham. We are now to learn that this rule of conduct, although very fit and proper as it applies to orthodox practitioners of medicine, by no means holds good of the relations between orthodox and heterodox practitioners.

“Oaths are not purposed more than law
To keep the good and just in awe,
But to confine the bad and sinful,
Like mortal cattle in a pinfold.”

Thus a medical man, of high local standing, has recently not only held a series of consultations with an homœopathic practitioner,

but, having fallen in consequence under the ban of his professional neighbours, he has sought to justify publicly his conduct, and even affects to be astonished at their susceptibility. We keep back, as altogether too transcendental in this case, the reasons which might be supposed to influence a member of an honourable profession, when brought into contact with a professor of perhaps the most stupendously impudent form of quackery that the world has yet seen.

We will grace the homœopath so far as to apply to him, for the nonce, a rule of conduct observed by regular practitioners of medicine. But even this leads us into an awkward dilemma; for so diametrically opposed are the creeds, pathological and therapeutic, of the regular practitioner in medicine and the homœopath, that no consultation between them is possible except by a sacrifice of principles on the part of one or the other, or of both. On the simple grounds of dissidence of opinion alone, therefore, consultation with a homœopath does not admit of justification.

The *Times* of June 4th contained the following telegraphic message:—

“*June 3rd.* On Sunday Count Cavour passed a restless night. He was bled this evening for the sixth time, and is now better. His physicians declare his illness to be a very mild form of typhus fever, without any very alarming symptoms.”

The first impression on reading this extraordinary despatch was, that it was a sorry but cruel jest. In the last number of this Journal* we printed a curious letter from the English Ambassador in Spain to Queen Elizabeth, illustrative of the practice of an Italian physician in the sixteenth century. He was in attendance upon the Queen of Spain in a febrile attack, and literally bled her until he could obtain no more blood—for after repeated bleedings from the arm, “searching to let more blood at her nose and other places (not one drop would follow, no more than of twenty ventoses or more applied all at once to sundry parts of her body).” Her Most Catholic Majesty was in fact bled to death’s door, and escaped by miracle. It seemed to us inconceivable that an Italian physician of any reputation in the nineteenth century would use the lancet as freely as it had been used in the sixteenth, and hope that at the worst the statement of the treatment to which Count Cavour had been subjected would prove to be a covert satire on Italian medical practice. “*Mon père, monsieur, est toujours malade de plus en plus,*” says the countrywoman to the physician in *Monsieur de Pourceaugnac*.

* See Art. *Miscellanea Medica*.

"Ce n'est pas ma faute," he replies; "je lui donne des remèdes : que ne guérit-il ? Combien a-t-il été saigné de fois ?" "Quinze, monsieur, depuis vingt jours." "Quinze fois saigné ?" "Oui." "Et il ne guérit point ?" "Non, monsieur."*

But alas ! on June the 6th Count Cavour, the great hope of Italy died, and on the same day the *Times* correspondent wrote:—

"Turin, June 6th.

"*Consummatum est.* Count Cavour died this morning at seven o'clock. It was understood yesterday that the night would be critical, and the issue of the crisis was scarcely doubtful, as the sufferer had not rallied in the morning, as had been the case with him in the previous days. All power of reaction had left him, and the new attack of fever was sure to find him powerless.

"The Romans, it is said, crowned on the Capitol the physician who rid them of Pope Adrian VI. The Italians of our own days would honestly hang Count Cavour's doctors if the execution would afford any relief to their feelings. There never was a clearer case of a man murdered by his medical attendants. Within a very short period of five days they attempted to cure the Count of four or more different complaints,—congestion of the brain, typhus fever, intermittent fever, brain fever, dropsy, and lastly, gout; and for all these diseases they could think of nothing but their own sovereign remedy—the lancet. I think these excellent practitioners are worthy to send down their names to posterity. They were,—Dr. Rossi, Dr. Mattoni, and towards the end, the King's physician, Riberi, the same in whose hands the mother, wife, and brother of Victor Emmanuel expired, one by one, in the early months of the fatal year 1855. Dr. Tommasi, who was summoned from Pavia by Cavour's friends, was not admitted to consultation.

"Notwithstanding frequent fits of delirium, Count Cavour seemed to have a distinct presentiment of his fate. Seeing himself alone with his domestic attendants, yesterday, he asked with great serenity, 'whether his doctors had forsaken him ?' On being answered with surprise and concern, that they could never have thought of leaving him for a moment, he replied with a smile, '*Domattina, gli abbandonero io*' ('It is I who shall quit them to-morrow morning')!"

Let us hope for the credit of medicine, that popular report has played false with the details of both diagnosis and treatment.

* Act i. sc. 7.

ART. XIII.—LITERARY GOSSIP AND RECORD.

IN the management of the different Medical Libraries of the Metropolis, in no single instance has the importance been recognised of one of them at least containing a complete series of English medical publications—that is to say, complete from and since the institution of the Library, and as perfect as possible anterior to that period. The most perfect collection of English medical literature is that in the Library of the British Museum, and supposing that that collection should be destroyed, the loss would be irreparable. In the prospect, therefore, of such a contingency, infinitesimal though we hope it may be, the subject is one worthy of the consideration of the managing bodies of medical libraries. But on mere bibliographical grounds alone, we think that at least one of our libraries should make it a rule to purchase every English medical work as published, and should strain every nerve to perfect its collection of national medical literature. The bibliographical importance of a work cannot always be determined at the time of publication, and it is a common matter of experience, that works thought of little moment then, become subsequently of value. Thus, for example (and not a solitary one, by the way), a short time ago we had occasion to refer in haste to the curious edition of the works of the celebrated Dr. John Brown, by Dr. Beddoes, and found that there is actually no copy either in the Library of the British Museum, that of the Medico-Chirurgical Society, or that of the College of Surgeons. Our engagements at the time debarred us from extending our search to other libraries, but, strange to say, we ascertained that there was in the British Museum Library the *German Translation of the book we sought*, as well as the edition of Dr. Brown's works, brought out chiefly in consequence of the supposed injustice done to him and his writings by Dr. Beddoes. This edition we also found in the Medico-Chirurgical and College of Surgeons' Libraries. The only mode of escaping such unfortunate shortcomings for the future, is by the purchase by at least one Medical Library of every English medical work as published, irrespective of its estimated literary or scientific value at the time. Such a proposition is by no means so formidable as it would at first appear, for the actual annual pecuniary cost of these works, including pamphlets, is by no means very large, and, we believe, quite within the limits of the resources commanded at least by the Medico-Chirurgical Society, without affecting the purchases of foreign works. To this Society, indeed, we rightly look as the

body most fitted to have respect to the bibliographical credit of the profession, and the pride already felt by the Fellows in their noble Library, ought to induce them to perfect its character as much as possible.

But the need for as perfect a Medical Library as is practicable to be obtained, apart from the National Library, is beginning, from other causes, to make itself sensibly, nay painfully felt, among literary medical men, who at the same time (as is the rule) are engaged in the practice of their profession. To them the Library of the British Museum is becoming a huge bugbear, and, at the best, a thing of scanty utility. For, in consequence of the crowds of readers, consequent upon the increased space provided for them, it frequently happens that an hour is spent (omitting altogether the time occupied in hunting for the book in the Catalogues) before a work wanted can be obtained, and rarely is a book procured under a period of twenty minutes. Thus, to the medical man in active practice, extended reading in the National Library is out of the question, and he is to a great extent deprived of its advantages, except in so far as he can avail himself of the Reference Library. But even supposing that the objection of delay be overcome, it not unfrequently happens that in spite of the splendid collection of medical works in the National Library, for sundry reasons not needful to detail here, the medical reader is obliged, in the pursuit of a given course of literary research, to circulate among the different Medical Libraries, hunting for this thing here and that thing there, at an inordinate expenditure of time and temper.

Now we do not for a moment imagine that these evils will, or can ever, be entirely eradicated, but we are certain that they might be very materially modified, if the managers of any one of the great Medical Libraries, would but consider that it was their duty to perfect the Library under their control at any cost. It may be that the readers of the present generation might not feel very sensibly the advantages arising from such a notion of duty being carried into effect, but the next most assuredly would—a sufficiently honourable incentive we opine.

We appeal, therefore, to the Council and Fellows of the Medico-Chirurgical Society; and now that they are possessed of the idea that their Society is not doing quite so much for the scientific credit of medicine as it might do, we would wish them to become also possessed of the idea that they are not doing as much for the literary credit of the healing art in this kingdom as they might do.

OUR LIBRARY TABLE.

Die Brandstiftungen in Affecten und Geistesstörungen. Ein Beitrag zur gerichtlichen Medicin für Juristen und Aerzte. Von

Dr. WILLERS JESSEN, 8vo. pp. 335. Kiel, 1860. *Incendiarism as depending upon the Passions and the various forms of Insanity.*—This is a large book upon a subject which might seem capable of being disposed of in an article of a journal, as indeed it was the author's original intention it should have been. He is well entitled to the credit he lays claim to for the laborious industry manifested in its compilation. Every one is aware, he observes, of the discrepancy of opinion which prevails upon the subject of incendiarism-mania, some maintaining and others stoutly denying its existence, and both parties basing their opinions upon facts, cases, and decisions. The opponents of its reality not only deny the sufficiency of the facts relied upon in proof of this, but themselves adduce cases of incendiarism in which no such mania existed—a negative procedure of very little utility, inasmuch as the fact of its non-existence in some cases is no proof that it may not prevail in others. The best means of deciding the dispute would seem to be the collection and critical examination of as many cases of incendiarism as could be obtained, and this is the task which the author set himself. Abundant material was thus obtained; but from amidst this, those cases had to be selected which were described with sufficient precision to allow of the detection of the motive and psychical process which had led to the action, and consequently the psychical condition of each malefactor. Of the cases so collected those which were due to passions or emotions, as revenge, fear, &c., were first separated from the cases in which some form of diseased mind could be traced, a certain number of the cases, however, seeming to form a connecting link between the two divisions. During this preliminary inquiry the question of the specific nature of pyromania had to be laid aside, and it soon appeared that this was a matter of no great signification. It was found that strong and determinate, which may therefore be termed specific impulses to pyromania resulted from various psychical processes, and that a number of different diseased conditions occurred which might be termed pyromania, but that there was no proof of a specific incendiary monomania or pyromania. The fundamental question is, what are the various general psychical conditions and processes that give rise to this impulse to incendiarism; and the object of this book is to exhibit these different circumstances. This is done, as we have already said, in great detail, each case being minutely analysed in order to trace out the nature of the motive or of the diseased condition upon which the action was dependent. In this way the author has assembled an instructive repertory of more than a hundred cases, which, although they have all been published before, have now the advantage of being collected together from scattered sources, and of being submitted to a critical examination by a competent hand.

On the Surgical Diseases of Women. By I. BAKER BROWN, F.R.C.S. Second edition, revised and enlarged. 8vo, pp. 410. London, 1861 (Davies).

The profession will heartily welcome a second edition of this valuable work. In its present form it contains much additional matter, more

particularly upon the following subjects:—Intra-Uterine Fibrous Tumours, Hypertrophy and Irritation of the Clitoris, Cauliflower Excrescence of the Uterus, Certain Diseases of the Rectum producing or simulating Uterine Disorder, Certain Surgical Lesions connected with Sterility, Ruptured Perinæum, Vesico-Vaginal and Recto-Vaginal Fistula, and Ovarian Dropsy.

One of the most notable and valuable features of the work is the copiousness of the clinical illustrations, so that the author is justified in stating in his prefatory observations, that he puts "the chief merit of the book in its being a mirror of clinical observation—a practical treatise on some most important surgical operations, the value of which is discoverable in the record of appended cases." Further he says, "I would commend this treatise to the members of the medical profession, not as a recondite treatise on the pathology of the several affections considered in its pages, but as a contribution to practical surgery; and with the hope that its publication may serve to advance and perfect the means of cure for a number of diseases ranking among the most painful to which woman is subject."

The author has fully justified this commendation, a fact which best indicates the high value of his work.

Elements of Medical Zoology. By A. MOQUIN-TANDON, Professor of Medical Natural History to the Faculty of Medicine at Paris. Translated and edited by ROBERT THOMAS HULME, M.R.C.S.E., F.L.S. London, 1861. (Baillière.) Small 8vo, pp. 41.

On the whole, we must own to a prejudice against mongrel works of this class, but on looking over M. Moquin-Tandon's Manual, we frankly confess that it is one calculated to be of great utility to many students, medical and pharmaceutical, and practitioners, and that Mr. Hulme has rendered a service to our medical literature by translating it—a service heightened by the judicious manner in which, in the exercise of his editorial functions, he has enriched the text with additional matter.

The author has, in this work, adopted an arrangement founded upon the characters of the animal or its Medico-Zoological relations. "Such an arrangement," as he observes, "is more practical than scientific; but it is simple, convenient, and well adapted for the purposes of medical or of pharmaceutical study, and avoids leading the reader into details which are foreign to his daily occupation." He adds, "Many animals and many animal productions, which were formerly in use, are no longer employed in medicine. These might have been omitted, but as it is useful to have a knowledge of the Ancient Materia Medica, and to be acquainted with the history, the revolutions, and the progress of therapeutics, I have given a short description of these animals and of their productions in a separate chapter." Medical Zoology, of necessity, also includes the Natural History of Man.

The manner in which both author and translator have effected their work will be best seen by one or two illustrations.

In the chapter on the Unity of the Human Species we read—

"Some naturalists have endeavoured to establish several distinct species of men.

"Linnæus in his *Systema Naturæ* (1766) admits two species of men, the *Homo Sapiens* and the *Homo Troglodytes*. Under the latter title he includes the *Albino*; these, however, are persons in a state of disease, and in the present day they are not regarded as even constituting a variety. Linnæus imagined that this supposed second species lived in caverns, and for this reason he bestowed upon it the name of troglodytes, characterising it by the epithet of nocturnal (*nocturnus*). At the end of his *Mantissa plantarum altera*, which appeared five years after the twelfth edition of the *Systema Naturæ*, the illustrious naturalist of Sweden committed the serious error of including in the genus *Homo* an ape, the *Gibbon* of Buffon, which he names *Homo Lar*; 'a surprising error committed by a great genius, which should never find imitators.' (Pouchet.)

"Virey (1821) also admitted two species of men, distinguished by the difference of aperture in the facial angle; in the one it varies between 85° and 90° ; in the other between 75° and 82° . In the apes it never exceeds 40° . These two species of men include six races characterized by their colour, and these again comprise eleven sub-races, which are arranged according to the regions they inhabit.

"Desmoulins (1824) divided the genus man into eleven species more or less distinct; the characters he gives them are often established with considerable ability, but they are always insufficient to induce us to reject the unity of the human race. He names these species:—1st, the *Celto-Scyth-Arabs*; 2nd, the *Mongols*; 3rd, the *Ethiopians*; 4th, the *Euro-Africans*; 5th, the *Austro-Africans*; 6th, the *Malays* or *Oceanians*; 7th, the *Papous*; 8th, the *Negro-Oceanians*; 9th, the *Australasians*; 10th, the *Columbians*; 11th, the *Americans*.

"Bory de Saint-Vincent (1825) goes even farther than Desmoulins: he admits fifteen species of men. These are:—1st, the *Japetic*; 2nd, the *Arabian*; 3rd, the *Hindoo*; 4th, the *Scythian*; 5th, the *Sinic* (Chinese); 6th, the *Hyperborean*; 7th, the *Neptunian*; 8th, the *Australasian*; 9th, the *Columbian*; 10th, the *American*; 11th, the *Patagonian*; 12th, the *Ethiopian*; 13th, the *Caffre*; 14th, the *Malanian*; 15th, the *Hottentot*. He arranges these fifteen species into two tribes: 1st, the *LEIOTRIX*, or those with smooth hair; this division includes the *Japetic*, *Arabian*, *Hindoo*, *Scythic*, and *Sinic* species belonging to the Old World; the *Hyperborean*, *Neptunian*, and *Australasian* species, common to the Old and the New, and the *Columbian*, the *American*, and the *Patagonian* species, peculiar to the New World; 2nd, the *OULOTRIX*, or those with crisp hair, containing the *Ethiopian*, *Caffre*, *Malanian*, and *Hottentot* species.

"In the present day man is generally regarded as constituting a simple species, in which all the individuals are capable of mingling indiscriminately, and are able to produce an offspring which is as fruitful as its parents."

Again, from the section devoted to Animals or Animal Productions formerly employed in Medicine, we learn that—

"The ancient therapeutists often sought for what they termed correspondence between the disease and the remedy, but it is impossible to conjecture what were the relations upon which they founded the virtues of many animal substances. Thus in spitting of blood, they recommended the patient to drink kid's blood mixed with vinegar; in diseases of the kidneys they prescribed the back of a hare to be eaten raw or cooked, *but without touching it with the teeth*; in diseases of the spleen, they applied the spleen of a dog over the region of the affected organ; in disorder of the liver, they ordered the dried liver of a wolf in wine sweetened with honey, or that of an ass bruised in honey with two parts of celery and three nuts!

"The following are some of these therapeutic agents which belonged to the ancient medical zoology, arranged in three series:—

"I. THE ENTIRE ANIMAL.

- 1st. *Simply opened or bruised*.—Bat, mole, pigeon, toad, tree-frog, spider, scorpion.
- 2nd. *Dried or reduced to powder*.—Hedgehog, titmouse, water-wag-tail, wren, goat sucker, plover, snake, toad, earthworm, bug, cricket, grasshopper, ant.
- 3rd. *Calcined and reduced to ashes*.—Badger, mouse (*mus combustus*), crow, cuckoo, kingfisher, lizard, salamander, slug, scarabæus.
- 4th. *Infused in water*.—Magpie (*aqua picarum compositum*), swallow (*aqua hirundinum*).
- 5th. *Boiled in milk*.—Toad.
- 6th. *Infused in oil*.—Dog (*oil of young dogs*), fox, hawk, cameleon, scorpion (*oil of Matthiole*), cockroach, earthworm.
- 7th. *Distilled*.—Ants (*water of magnanimity*).

"II. BONES of the dog, wolf, hare (*astragalus*), horse, stag, eagle (*skull vertebræ*), toad (*left humerus*), carp, shad, and whiting.

"III. BLOOD of the bat, lion, dog, mole, weasel, hare, rat, horse, ass, elephant, rhinoceros, bull, camel, stag, goat, goldfinch, lark, pigeon, cock, pheasant, quail, ostrich, swan, duck, tortoise, lizard, frog, tree-frog, and snake.

"IV. FAT of monkey, dog, wolf, fox, wild cat, hedgehog, badger, rabbit, hare, marmot, beaver, porcupine, dormouse, ass, elephant, stag, fallow-deer, camel, eagle, falcon, kite, common fowl, pheasant, cassowary, heron, frigate bird, pelican, lizard, snake, frog, tree-frog, carp, pike, eel-pout, and lamprey.

"V. COVERING.

- 1st. *Skin* of mole, horse, ass, rhinoceros, eagle, tench, and eel.
- 2nd. *Hair* of cat, fox, hare, horse, ass, elephant, goat, camel.
- 3rd. *Feathers* of eagle, lark, partridge.

"VI. SHELLS.

- 1st. *Univalves*—snail, rudimentary shell of slug, whelk, dentalium.
- 2nd. *Bivalves*—common mussel.
- 3rd. *Epiphragma* of the large Roman snail.
- 4th. *Pearls* of the pearl oyster and the mussel.

"VII. NUTRITIVE ORGANS.

- 1st. *Jaws* of the pike, trout.
- 2nd. *Teeth* of wolf, badger, wild boar, cod, &c.
- 3rd. *Tongue* of grouse, flamingo.
- 4th. *Stomach* of hedgehog, pigeon, common fowl, crane, ostrich, eel-pout.
- 5th. *Intestines* of wolf.
- 6th. *Spleen* of dog, ass.
- 7th. *Liver* of wolf, mole, bear, badger, weasel, otter, hare, porcupine, elephant, goat, roebuck, eagle, swan, duck, lizard, frog, eel.
- 8th. *Kidneys* of ass.
- 9th. *Lungs* of fox (*pulmones preparati*), weasel, hare, pig.
- 10th. *Heart* of monkey, lion, mole, stag, crow, peewit, kingfisher, toad."

In an equally interesting and serviceable manner the excrementitious matters, and the different parts of the organs of relation and reproduction, &c., are summed up.

The following account of the *Tsetse* will afford an excellent illustration of the more strictly zoological portions of the work:—

"The *Tsetse* or *Tzetse* is a very formidable Fly which inhabits Africa. Bruce, who met with it in Abyssinia, has given a bad drawing of it, but has correctly described its habits.

"MM. Arnaud, Livingstone, Oswald, L. de Castelnau, and Anderson, have collected many curious details concerning this insect. Mr. Westwood has given a very good description of it.

"The *Tsetse* belongs to the genus *Glossina*. It is named the *Biting Glossina*, *Glossina morsitans*, Westw.

"Nearly all the central countries of South Africa are more or less infested by the *Tsetse*; it is very common in all the countries situated to the north of Lake Ngami; and is again met with in Soudan and in the tropical districts.

"This insect usually frequents the bushes and reeds on the borders of marshes. It is larger than the common fly, and of a whitish yellow colour; the thorax is of a pale chesnut on its upper surface, is covered with grey hairs, and has four longitudinal interrupted black bands in the centre; its proboscis is twice as long as the head, and is extremely slender; it resembles a fine corneous thread; the palpi are straight, of the same length as the proboscis, and form a sheath for it; the abdomen is a light yellow with darker spots or bands; the wings are smoke-coloured.

"The buzzing of the *Tsetse* is a mixture of a dull and a sharp sound, producing a very discordant noise; this buzzing spreads a terror and disorder amongst men and animals which even the wild beasts of the country when they are twice their number will not produce. (Bruce.)

"Its vision is extremely acute, and it darts like an arrow upon the animal that it intends to attack; it always makes its puncture between the belly and the thighs, when a swelling soon rises up around the wound.

"The horse, the ox, and the dog, after they have been attacked by this insect, waste away and die in the course of a few days; those which are fat and in good condition, soon die, while the others drag on a miserable existence for some weeks; three or four flies are sufficient to produce these disastrous results. The blood of the animals which die is altered and diminished in quantity; the fat in the neighbourhood of the wound is soft, viscous, and of a yellow colour; in general, some portion of the intestines is enormously swollen; the flesh putrifies very quickly (Castelnau); and the heart, the lungs, and the liver are more or less affected. The goat is the only domesticated animal which can live with impunity in the midst of these flies; dogs escape the danger when they are fed exclusively by means of the chase, but if these animals are fed with milk they invariably die; on the contrary, the calf has nothing to fear so long as it sucks.

"The bite of the *Tsetse* is not dangerous to the wild animals; the elephant, zebra, buffalo, and the various kinds of antelopes and gazelles which abound in the countries inhabited by this fly, do not experience any ill effects from it.

"These insects do not bite when it is bright moonlight, or when the nights are very cold.

"*Action on man.*—The *Tsetse* also attacks our species, but its action on man is attended with but little danger; its bite is very analogous to that of the gnat's, but the pain does not last so long. (De Castelnau.) M. Arnaud, however, suffered for some months after being bitten by one of these insects.

"M. Chapman, one of those who have penetrated the furthest into the interior of South Africa, states, that whilst he was hunting, having a small hole in his dress made by a pin, he has often seen one of the *Tsetse*, which appeared to know that it could not penetrate his dress, dart down, and, without ever missing its mark, wound him through the undefended opening.

"Is the *Tsetse* a poisonous animal? Its effect on the domesticated animals would appear to answer the question in the affirmative, but its action on man declares the contrary. How then are we to explain its fatal effects on cattle?

At the same time these results vary in different species, and in some they are of no consequence."

Epileptic and other Convulsive Affections of the Nervous System, their Pathology and Treatment. By CHARLES BLAND RADCLIFFE, M.D., F.R.C.P., Physician to, and Lecturer on Materia-Medica and Therapeutics at, the Westminster Hospital, &c. Third Edition. London: Churchill. 1860. Small 8vo. pp. 312.

In the third edition of this well-known work Dr. Radcliffe has incorporated the Gulstonian Lectures, which he delivered at the Royal College of Physicians, in the spring of 1860. He has also re-written and re-cast his materials "so as to make a new book rather than a new edition." Dr. Radcliffe, as will be familiar to our readers, seeks to establish an entirely new theory of muscular action, which, being confirmed, would revolutionize our notions upon the pathology and treatment of convulsive disorders. In the previous series of this Journal, on the publication of the second edition of Dr. Radcliffe's work, we entered largely into the consideration of his physiological theory,* and the favourable opinion we then formed of it, as well as the high value we attached to its bearing upon pathology and treatment, are abundantly confirmed by the maturer arguments contained in the present volume. He holds that, "In opposition to the theory which supposes that muscle is endowed with a vital property of contractility, and that contraction is brought about when this property is roused, or excited, or *stimulated* into action, it may be held that there is a state of polarity in living muscle during relaxation which produces relaxation, and that contraction is nothing more than the necessary result of the muscle being liberated from this state and left to the operation of the attractive force which is inherent in the physical constitution of the muscular molecules."

In illustration of the singularly suggestive character of the present volume, we may quote the following observations on the part the medulla oblongata plays in epilepsy:—

"It is evident, then," writes Dr. Radcliffe, commenting upon Dr. Van der Kolk's researches, "that the medulla oblongata is especially affected in epilepsy; but it does not follow, as Dr. Van der Kolk supposes, that the essential cause of the convulsive affection is to be found in an exalted sensibility and activity of the ganglionic cells of this centre.

"In favour of this view,—that epilepsy is dependent upon exalted sensibility and activity of the ganglionic cells,—this physician appeals to the fact of spasm, to the presence of a full, bounding pulse, and to the freedom from attack which is for some time the fruit of an attack, particularly if this has been violent; but it is easy to see that this appeal is one which cannot be allowed. After what has been said about muscular motion, it is not possible to allow that spasm is an argument in favour of exalted sensibility and activity in ganglionic cells. After what has just been said about the phenomena of the circulation in epilepsy, it is not possible to allow that the full and bounding pulse of the epileptic paroxysm is produced by increased injection of arterial blood into the vessel. If this could be allowed, there would be no difficulty in supposing that this

* See *Journal of Psychological Medicine*, vol. xii. p. 89.

pulse must imply exalted action of the medulla oblongata—for the action of any organ must be in direct relation to the amount of arterial blood supplied to it; but, so far from this being the case, the simple fact is that the full and bounding pulse of the epileptic paroxysm is the pulse of suffocation—a pulse which is filled with black blood, not with red. And thus the notion of increased injection of arterial blood during the epileptic paroxysm falls to the ground, and with it the theory of exalted activity of the medulla oblongata, which has been based upon it. Nor can the freedom from attack, which is for some time the fruit of an attack, be appealed to as a certain proof that the attack is the sign of the discharge of some overcharge of excitability previously present. On the contrary, it may be argued with some degree of plausibility, from certain facts which have to be mentioned hereafter, that the attack was preceded by depression of the circulation and innervation, that the convulsion supervened when this depression had reached a certain point, and that the recurrence of the attack was prevented for a time by the state of reaction in the circulation and innervation, which is a consequence of the convulsion. The case may be one, indeed, of which the history of the rigors of ague may serve as no inapt illustration; for here we have, first, the circulation failing more and more until the bathos of the cold stage is reached, and then a state of reaction which banishes the rigors most effectually so long as it continues.

"It would even seem as if appeal might be made to the appearances after death, and to the actual condition of the circulation in the fit, for positive arguments against the idea of anything approaching to exalted action of the medulla oblongata.

"The signs of fatty degeneration can have but one significance—under-action, not over-action. The interstitial deposit, also, implies an equivalent absence of healthy nerve structure, and so does the dilated condition of the blood-vessels; and this absence of nerve structure must necessitate a corresponding absence of nervous action. The appearances after death, indeed, if they show anything, would seem to show that the medulla oblongata of the epileptic is *damaged in structure*, and because damaged in structure, *weaker in action* than it ought to be.

"The great argument against the idea of anything like over-action of the medulla oblongata in epilepsy, however, is to be found in the state of the circulation; for if, as may safely be assumed, the activity of any organ is in direct relation to the activity of the circulation of *red blood* in that organ, how far from anything like over-action must be the state of things in which, as is the case in the epileptic paroxysm, the vessels are at first comparatively empty of red blood, and afterwards completely filled with black blood?"

Dr. Radcliffe next shows that Dr. Brown-Séquard's experiments on the spinal cord cannot be "construed into an argument that there is anything like a state of exalted action of the *spinal cord* in epilepsy," and he then proceeds:—

"But, it may be asked, is there nothing else? Is there no peculiar state of the nervous system in epilepsy? Is there no '*morbid irritability*'? In order to answer this question, it is necessary to ask another—What is '*morbid irritability*'? It is not inflammation; it is not fever; it is some indefinable and negative state which occurs frequently in teething, in worm disease, in uterine derangement, and in many other cases—a state in which the patient is unusually depressed by depressing influences, and unusually excited by exciting influences. But what is this state? Is it anything more than mere exhaustion? In difficult teething, the strength is worn away by pain and want of sleep; in worm disease, the parasites help to starve and exhaust a system already ill fed and feeble; in uterine derangement, the health is undermined, in all probability,

by pain and by sanguineous or other discharges. In each case there is unequivocal exhaustion of body and mind, and the signs of 'morbid irritability' appear to be nothing more than the signs of such exhaustion. A weak person is more affected by the several agencies which act upon the body from within and from without, and he is so because he is without some of that innate strength which belongs to the strong person; and the person who is 'morbidly irritable' is, in reality, one who, for want of this principle of strength, is inordinately excited or depressed by the several exciting or depressing influences which are continually acting upon the system. In a word, this undue 'morbid irritability' may be nothing else than the natural consequence of that general want of power, the signs of which are written so legibly upon the vascular and nervous systems of the epileptic. Thus interpreted, indeed, 'morbid irritability' only becomes another name for inefficient innervation.

"In these points of view, therefore, *the pathology of ordinary epilepsy* would seem to be altogether unintelligible upon the current theory of muscular motion—a theory according to which the muscles are supposed to contract convulsively, because they are subjected to excessive stimulation. In these points of view, indeed, the pathology of this disorder would seem to be only intelligible when it is interpreted by the theory of muscular motion which is advanced at the commencement of this volume."

In the medicinal treatment of epilepsy, Dr. Radcliffe makes the following highly important suggestions, which alone suffice to stamp the great practical value of his work.

"Reflecting upon the physiological and pathological premises, the great desideratum in a case of epilepsy would seem to be a more vigorous action of the nervous centres, for, according to these premises, convulsion itself is the consequence of a failure in this action; and hence it may be supposed that the remedy which has yet to be applied is one which will have some special power of rousing and sustaining the action which is deficient. Reflecting upon what has already been said respecting the beneficial influence of cod-liver oil in epilepsy, and upon the possibility that this remedy may do good by furnishing one of the materials, namely, the fat, which is necessary to the full nutrition of the fatty nervous tissue, it may be supposed that the remedy which has yet to be applied is one which will supply this kind of food to the nervous system. But is this all? Is there any material besides fat or oil which may be wanted to secure the healthy nutrition of the nervous system? These questions suggest themselves naturally; for however mysterious the properties of the nervous system, this much is plain enough—that the nervous tissue cannot exist independently of proper nutrition, and that any means which will merely rouse its action, without at the same time providing for its nutrition, must in the end do harm, and not good. Now, on examining the chemical constitution of nervous tissue, it is evident that phosphorus is a very important ingredient. It is evident, too, that the amount of fat and phosphorus has some relation to the activity of the nervous centres, for both these ingredients increase from infancy to adult age, and decrease afterwards as the influence of advancing age tells upon the system. It is also a most significant fact that the proportions of fat and phosphorus approximate very closely in infants and idiots. . . . The ingredients of the spinal cord and of the nerves are substantially the same as those of the brain, and there is reason to believe that the proportions of fat and phosphorus vary in the same manner at different periods of life. Here, then, are some very curious and striking facts. Here is nearly two per cent. of phosphorus in the brain of adults, and in infants and idiots considerably under one per cent. Here is, that is to say, little more than half the proper proportion in a state between which and the worst forms of epilepsy there is a somewhat close relationship. The facts, indeed, are well calculated to suggest the question

whether phosphorus may not be as necessary as fat to the proper nutrition of a weak nervous system—as necessary as iron where there is a deficiency of red corpuscles in the blood; and this question, once put, would seem to require an answer in the affirmative. ‘In *small doses*,’ says Dr. Pereira, ‘phosphorus excites the nervous, vascular, and secretory organs. It creates an agreeable feeling of warmth in the epigastrium, increases the fulness and frequency of the pulse, augments the heat of the skin, heightens the mental activity and the muscular powers, and operates as a powerful sudorific and diuretic.’ In large doses, phosphorus, without doubt, is a caustic poison; in proper doses it produces the very changes which are necessary in a case of epilepsy. In proper doses, and under the eye of a medical man, it is quite innocent of harm, and it may be productive of much good.

“This inference is that which may be drawn from what has been said; and this inference, so far as I can see, is not contradicted by experience. Given in the large doses in which phosphorus has been given in a few cases already on record, the good resulting may have been doubtful—very doubtful; but this experience is nothing to the point, for there is no reasoning in any case as to the effects of medicinal doses from the effects of poisonous doses. Given in medicinal doses, I have seen enough to know that this remedy may be given, not only without harm, but with the unmistakeable promise of real and substantial good. As yet my experience is very limited, for it is only the other day that the idea of using oil and phosphorus as nervine tonics occurred to me; but, as I have just said, I have already seen enough to justify me in saying what I have just said. I have also seen what leads me to expect that the promise of good from this mode of treatment is not confined to cases of ordinary epilepsy, but that it includes other cases in which the action of the nervous centres, one or more, is defective—namely, two cases of hysterical paraplegia, one case of weakness of the arm and leg on one side following some choreic symptoms, and one case of melancholia. The form in which I have given the phosphorus is the phosphorated oil of the Prussian Pharmacopœia—a preparation which is made by dissolving twelve grains of phosphorus in one ounce of almond oil by the aid of warm water. About four grains of the phosphorus are taken up, and the usual dose is from five to ten minims. I have given this phosphorated oil along with cod-liver oil, in a little orange wine, twice or thrice a day, the formula being—

“℞ Olei Phosphorati (Ph. Borussicæ), ℥ v—x;
Olei Morrhuæ, ℥ii—iv. M.”

On Epilepsy and Epileptiform Seizures: their Causes, Pathology, and Treatment. By EDWARD HENRY SIEVEKING, M.D., F.R.C.P., Physician to, and Lecturer upon Materia Medica at, St. Mary's Hospital. Second Edition, revised and enlarged. London: Churchill. 1861. Small 8vo. pp. 336.

Dr. Sieveking's and Dr. Radcliffe's works should be placed upon the same shelf. The former is the best systematic treatise we possess on the subject in the English language, the latter the most ingenious attempt to penetrate the mystery and construct a theory of the subject, and the one most fertile in practical results.

The present enlarged edition of Dr. Sieveking's work will add to the reputation of its author, and confirm the work in the favour of the profession—if, indeed, such confirmation were necessary.

The following illustration of the conjunction of hallucinations with epilepsy, given by Dr. Sieveking, will be read with painful interest:—

"Since the publication of the first edition of this work, the profession has lost one of its brightest ornaments, Professor Alison, of Edinburgh, in whose case hallucinations and delirium were associated with epilepsy. In the account given by Dr. Patrick Newbigging of the illness and death of this eminent physician and teacher, we find that his first seizure in 1846 was followed by delirium of a violent, and, for such a man, highly demonstrative character. The fits recurred at intervals of six weeks till 1850; they then became more frequent and severe, some being followed by headache and nervous excitement. In 1854, after a severe seizure in the month of October, Dr. Alison suddenly became delirious; the delirium passed off on the following day, and the patient recovered his usual state of health. During the next five years the frequency of the fits fluctuated a good deal. 'The nature of the terrible attacks,' to employ the author's words, 'to which Dr. Alison had become so great a martyr, gradually underwent certain changes. They became less numerous, but the fits were greatly increased in severity, and during this year the condition of my patient after the fits was very formidable and most painful to witness—the delirium assuming more and more the maniacal character, and latterly the difficulty of restraint, even with the assistance of two or three male attendants, was very considerable.' Towards the close there were frequent changes from comparative quietness to complete maniacal excitement until within a few days of dissolution, when Dr. Alison's state was thought to resemble that of a person sinking under typhoid fever. 'There were brief intervals towards the close,' says Dr. Newbigging, 'when our patient was sensible, was able to express his thanks to those around him in his usual calm manner, and when he stated his belief that his end was approaching. But these peaceful moments were soon followed by excitement characterized by violent spasmodic action and screaming, accompanied by a peculiar rotatory movement of the hands, or by a condition very frequent in the earlier attacks, at a certain stage of the seizure, when he seemed lost in the contemplation of some blessed vision, during which he expressed his belief that he heard the praises of the heavenly hosts, and that among the number he distinctly recognised the voices of dear departed friends.'"

After detailing the opinions of Brown-Séquard, Kussmaul and Tenner, and others upon the nature of epilepsy, Dr. Sieveking thus sums up his matured opinions:—

"I must leave the opinions and statements of the distinguished physiologists to whom I have referred in the preceding pages, to the judgment of the scientific world at large. It is not for me to do more than thank them for the light they have, each in his way, shed upon the labyrinth in which so many have lost themselves. But I cannot but dwell upon the fact, that they all agree with regard to the essential identity of the various forms of epilepsy, which have been distinguished from one another according to the nature of the exciting cause. Whether the tubercula quadrigemina, the pons and crura cerebri, or the medulla oblongata, be regarded as the main seat of the disease, the irritation conveyed to them,—through the mind, from any other part of the nervous centres, from another viscus, or from a cutaneous nerve,—equally excites the paroxysms through the agency of the same part of the cerebrum. The real difference between different forms of epilepsy consists in the different excitability of the individuals; in one it is such that the perverted action once having been set up, it exhibits a self-multiplying power which cannot be controlled; in another the excitability is so slight that the removal of the particular stimulus puts an end to all display of that excitability; while again, in a third, the excitability is moderate, but persistent, and liable to be called into action by any tolerably strong stimulus that may at any time be offered. It has been said, and I think with truth, that the possibility of producing epilepsy

in every individual only depends upon the possibility of discovering the particular kind of stimulus which shall in him rouse his excitability to a certain point.

"Given the peculiar sensitiveness of the cephalic centre, which, on the application of a certain irritant, induces the paroxysm, what are the channels through which the irritant operates? Certainly in most, if not in all cases, it acts through the blood. A mere change in the balance of the circulation suffices in many instances; and if to that change a change in chemical constitution be added, the complication renders the physician's duty the more difficult. I might quote many cases illustrative of both these aspects. The following brief sketch of one may serve to show how epilepsy may depend upon an alteration in the balance of the circulation.

"A young lady consulted me, through the mediation of Mr. Spencer Wells, in whom I could not but regard the disturbance in the balance of the circulation as the main element in the production of the epilepsy to which she had been subject for three years and a half. She is now (June, 1857) sixteen years of age, and has always enjoyed admirable health, with the exception of the fits, which possess the pathognomonic features of epilepsy. After a minute and searching inquiry, the only fact of any importance discoverable in connexion with the disease is that, although an older sister had menstruated at thirteen, she herself has not as yet manifested any symptoms of the catamenial function; and at the time at which she would have menstruated had she followed her sister's example, but at which in her the fits made their appearance, the occasional attacks of epistaxis ceased to which she had been previously liable. One could scarcely avoid, in this instance, arriving at the conclusion that an *error loci* afforded the therapeutic indication; and that the disturbance in the circulation, acting upon a susceptible nervous system, deranged the polarity of the latter. As yet no material derangement of the nervous and intellectual functions are manifested; and were, from other causes, death to occur suddenly at this time between the paroxysms, I doubt whether it would be possible to detect any kind of lesion indicating an altered nutrition of the cephalic centre.

"I believe that, in the great majority of instances of epilepsy, the first attack is due to an irritation produced by derangement in the amount or quality of the blood circulating in the brain." In a person predisposed we frequently find over-fatigue, a long walk, carrying heavy loads, prolonged mental exertion, the manifest cause not only of the first, but of many succeeding seizures. Hence there will be occasion, in discussing the treatment of the disease, to dwell much upon the necessity of bodily and mental rest, so as to allow the system to recover that balance, the disturbance of which gave rise to the seizure. This is more marked in some cases than others; but in none can our remedial agents be attended with any beneficial result unless we have a regard to this important indication."

Diagnostics of Aural Disease. By S. E. SMITH, Esq., M.R.C.S Eng. London: Baillière. 1861. 8vo. pp. 106.

This is a skilfully written work, adapted as well for the removal of popular errors on the subject among the public as for the profession. The reasons for its publication are best expressed by the author himself in the following telling observations:—

"We confess ourselves at some loss to what cause to impute the fact that so little has been done to diffuse a general knowledge of the diseases to which humanity is prone. In an age when so much is being accomplished for the diffusion of knowledge on almost every other subject, there is evidently some

cause for surprise that so little has been attempted in this direction. It might be suggested that those who are able to present such works to the public in an attractive form, and yet withal correct in their details, and useful in their ultimate results, consider it a little below the dignity of their vocation, or beyond the legitimate scope of their profession; or it may be, that there still remains in them a small amount of that old conservative spirit (which, by the by, can scarce be the true spirit of conservatism), which fears the extension of knowledge, or dreads the consequence of science made popular. This is, at the least, but to create a monster after the fashion of Frankenstein, and to be alarmed at its shadow. Whatever may be the cause, the fact still remains; and whilst the study of chemistry is becoming daily more diffused, anatomy and physiology, the laws of health and disease, are forgotten, at the same time as the line of the poet—

“‘The proper study of mankind is man.’”

“There cannot be a doubt that medical men are the persons best qualified to make the public acquainted with these subjects; but they appear to look at the work with fear and trembling, lest in its performance they should be deemed empirics and charlatans. A little reflection would serve to convince them that their fears are groundless, and that they leave a *duty* unperformed in not taking the task out of the hands of those less fitted to render it the justice it deserves. There are many vulgar errors to be exploded, many wrong notions to be set right, and there is much room left for sound instruction, which in the end will not diminish the need of medical men, nor decrease the limits of their practice. On the contrary, a correct appreciation of the dangers of delay, and a ready recognition of the early stages of disease, will send sufferers sooner in search of good medical advice, than while under the spell of ignorance, when slight indispositions are ascribed to all imaginable causes but the right, and the most absurd steps are taken to abate maladies which have no existence save in imagination and the fabulous history of the past. Not that we intend to advocate the publication of a series of handbooks on domestic medicine, or to recommend how one reader may physic his friend, or operate upon his neighbour; but rather that he may understand, appreciate, and respect the house in which his spirit dwells, and know when it is getting out of order; the consequences liable to ensue; and how he may preserve himself from such forms of disease as may result from either ignorance or carelessness. How often do we meet with cases in which we are compelled to give expression to our regret that the patient had not earlier become sensible of the encroachments of disease? How often have we to say, Why did you so long defer an application for medical advice, and allow your disease to gain so firm a hold upon you? Such remarks are common enough, and much more common than they would be if a better knowledge of the laws of health were more widely diffused. We rejoice that general attention is being directed to these subjects as being in every sense worthy of forming a portion of the elementary instruction to be imparted to our children in the public schools; and when steps are in progress to organize systematic instruction on these points for children, it seems an anomaly that those who have grown up without obtaining such a knowledge, should be forgotten, and no steps taken to remedy the deficiency.

“It may be argued, and with much consistency, that this is the only true means whereby the army of charlatans in medicine will be defeated. Diseases are not as formerly so much imputed to the influences of the heavenly bodies. Nor is their care supposed to depend upon the movements of the planets; yet errors equally superstitious, if not equally gross, are daily committed. We might refer to some of the malpractices in connexion with diseases of the ear to which reference has been made in the foregoing pages, in confirmation of this statement; and indeed there is scarce a form of disease which has not its

popular form of treatment, based more or less on some traditional success, honoured perhaps in its antiquity, but which would be much more 'honoured in the breach than the observance.' The belief in panaceas and 'pathies' of all kinds will vanish before the spread of an enlightened knowledge of physiology and the unchangeable laws which govern health and disease."

Transactions of the Epidemiological Society of London. Vol. i. pt. 1. London: Richards. 1860. pp. 128.—We are most glad to receive the Transactions of the Epidemiological Society as a separate work. We think the Society has done well in thus giving to its proceedings a more definite literary form, and we augur highly for the value of its future Transactions from the specimen now before us. This part, in addition to the President's Address at the opening of the Session 1859-60, contains also the following papers:—On the Theory of Zymosis, by Dr. A. W. Richardson; Report of the Diphtheria Committee; Suggestions for Utilizing the Statistics of Disease among the Poor, by Dr. Milroy; and Remarks on the Topography and Diseases of the Gold Coast, West Coast of Africa, by Robert Clarke, Esq., late of H. M. Colonial Medical Service. Each of these papers presents points of unusual interest, and, in addition to them, we would especially note the valuable report on the progress of epidemics in 1859, by Dr. MacWilliam, C.B., F.R.S., the Secretary to the Society, incorporated in the Address of the President. We regret that, in consequence of the late period to which our notice of the Transactions has been deferred, we cannot do more than briefly direct attention, not only to this report, but also to the different papers.

On Some of the Medico-Legal Relations of the Habit of Intemperance. By ROBERT CHRISTISON, M.D., F.R.C.P.E., V.P.R.S.E., Senior Ordinary Physician to Her Majesty in Scotland, Professor of Materia Medica in the University of Edinburgh, &c. Edinburgh: A. and C. Black. 1861. pp. 60.—In this pamphlet Dr. Christison has made public a Lecture which he delivered at the *Conversazione* of the Royal College of Surgeons of Edinburgh on the 19th of March. 1858. The subject is one the importance of which could not well be exaggerated, and one that has been pretty frequently dealt with in the pages of the previous series of this Journal. Dr. Christison's opinions on the questions raised cannot fail to exercise great influence over both professional and public feeling in the matter, and we shall give them space commensurate with their weight rather than with the modest aspect of the pamphlet through which they are made known.

"There is," writes Dr. Christison, "in the present condition of society, a great defect in the treatment of the habitually intemperate, whether we look to the care of their health and person, or to the charge of their affairs and property. And in the profession of the law, while I have recently met with individuals well qualified to judge of the matter from its legal side, who are disposed to arrive at the same conclusion, I have on the other hand ceased of late to encounter anywhere that summary dismissal of the subject with which it used to be disposed of by my legal friends no longer than fifteen or twenty years ago."

The prejudice which lawyers entertain to any extension of legal power for the control of drunkards, Dr. Christison thinks is dependent :—

“*First*, on the wholesome unwillingness of the legal mind to discover defect in the statutes or their administration; *secondly*, on the rarity with which the members of the law are brought into direct contact with cases of habitual intemperance in its bearings upon law; *thirdly*, on the intricacy with which habitual intemperance, as a disease, is interwoven with habitual intemperance as a vice, and the natural repugnance of law no less than common sense, that the vice of intemperance should be dealt with in any other way than by moral suasion and religious influences; and *fourthly*, on the tendency of lawyers in common with the educated public at large, to regard insanity too much as a mere object of coercion, and not like medical men, as rather a subject of treatment for which coercion is nothing else than a necessary condition.”

Conceiving that there is “no fitter way of explaining the relations of intemperance to insanity, and through insanity to the civil law, than by presenting the views entertained on those subjects by the medical profession,” Dr. Christison proceeds to describe the “leading phenomena of habitual intemperance from the simplest form of intoxication without any other manifest disturbance of the mind, to that in which the fit ends with simple delirium tremens; and then to the complication, in which delirium tremens in its turn gives place to mere weakness of mind, or to maniacal delusions or to ordinary general mania.”

He next forcibly sketches the blending of the phenomena of habitual drunkenness with those of ordinary mania and the embarrassment arising therefrom in a legal point of view. He then proceeds :—

“On considering attentively the several varieties of disturbance of the mind which may thus occur in connexion with the habit of frequent excess in alcoholic liquors, it will evidently appear that there are many varying modes and degrees in which these mental states must be apt to affect the civil rights and other legal relations of the persons who suffer from them. Regarding some of these influences I am not quite competent to form or pronounce an opinion. But I believe they will be all easily settled in the hands of any lawyer of ability, if law and medicine could come to agreement on a question in which medical men, as exercising the healing art, are first concerned, but lawyers not less so, as it deals with the most important of all civil rights—personal liberty, and the privilege of doing what one likes with his own.

“Without some modification of the law, or at least a change in the mode of applying it, in respect to the personal liberty and the management of the affairs of habitual drunkards, it is impossible for medical men to subject such persons in due time to the proper treatment for their cure, or to ensure its due continuance. This is one great defect for which medical men earnestly crave a remedy. But at the same time it is quite evident that, if this question be satisfactorily settled, other points also will be equally settled—such as the public safety, the safe custody of the individuals themselves, the security of their affairs, the happiness and well-being of their families. Nor will the lawyer, in such circumstances, experience any great difficulty in laying down principles for determining how far persons so situated must submit to curtailment of their right to enter into various civil contracts.

“In that form of the effects of intemperance in which the craving for strong drink passes through the stage of delirium tremens into ordinary general mania,

there can, of course, be no doubt of the necessity of some such complete restraint as an asylum and a curator. There can be scarcely more doubt about the last form which I have described, in which sundry delusions become permanently fixed, some of them dangerous. Even when mere feebleness of intellect during the intermissions between the fits of drinking is very great, treatment is not easy except in an asylum; and certainly the subject of such infirmity cannot take due care of himself, his family, or his affairs.

"On the other hand, in the moderate forms of simple repeated brief intoxication, which pass by insensible shades into the case of mere slight irregularities, opposed to modern manners, but not referrible to an intense craving, interference of the law in any shape is to be deprecated, and would be denied. And yet we must not lose sight of the undoubted fact, that such minor shades of avidity for intoxicating liquors, which, amidst the improved habits of the present day, will make any man painfully conspicuous, are too often the sure prelude of what is to become, ere long, an insatiate ungovernable craving.

"But, thirdly, there is a great body of habitual drunkards who are placed in the mean between these two extremes; and for whom perfect liberty and rigorous confinement are alike unsuitable. To this denomination belong the continuous and periodical drunkards, who sustain no other perturbation of their faculties than frequent and protracted intoxication,—many of those who have also, in addition, delirium tremens, but nothing further,—and some who, in the intermissions, are likewise affected with only a moderate degree of feebleness of mind, or with some harmless monomaniacal delusion. Many such drunkards have so great an amount of intelligence during the intermissions between their drinking-bouts, that they can mingle with decency in society, and even apply themselves successfully to their ordinary vocations. To them, confinement in an asylum, if in some respects useful, is hurtful in others. For the mind very soon recovers its healthy tone under the discipline of an asylum; repugnance to confinement invariably follows; and the straining against restriction sometimes positively impedes the progress of cure of the fundamental disorder. Besides, such persons really thus cease soon after admission to come under the provisions of the statute which authorizes detention in an asylum on account of lunacy.

"It is for this numerous class that physicians anxiously desire that another kind of restraint be legalized, for the sake of their cure. It is important, however, to bear in mind, that the legislation of a modified restraint for that end would also fix a defined landmark for regulating the law in the application of other checks of a purely legal bearing."

After treating briefly of Salvatori's topographical description of habitual drunkenness, Dr. Christison adds—

"Having advanced thus far, I may be asked to define what constitutes drink-madness. This, however, I will decline. I fear that, in an attempt to do so, we should lose sight of facts in the mazes of logic, and the clouds of psychology. But, as a practical rule for both lawyer and physician, I will venture to state the proposition that, when in a particular case the avidity for strong liquors has reached such a height as—1. To cease to be controllable by every plain and powerful moral and religious consideration; 2. To overwhelm the mind in frequent or continual intoxication; and 3. To occasion danger or actual damage to one's affairs, or family, or both—it ought to be regarded as a disease, and treated as an insanity.

"It has been urged, as an objection to treating the ungovernable avidity for strong drink as a disease and an insanity, that a distinction cannot be drawn between intemperance the disease, and the vice intemperance. I do not, however, exactly comprehend where lies the objection. The distinction is impossible in theory, because we have seen that the disease may originate in the vice, and the transition from the latter to the former is almost imper-

ceptible. But whence the necessity for a distinction at all? If it be right to cure the disease, it is surely not less so to cure the vice. And it ought to be satisfactory, rather than otherwise, that both ends will be simultaneously attained by the same means.

"Equally unpractical and futile is the objection that we cannot draw the boundary between the degrees of the disease which require restriction of liberty, and those which must be admitted to be too slight to warrant any interference of the kind. For, in the first place, there is no other form of insanity which is not similarly circumstanced: secondly, however difficult it may be to draw the boundary in an abstract definition, the difficulty cannot be great in actual practice, when it is an individual case we have to deal with: and thirdly, if in doubtful circumstances liberty should chance to be invaded on somewhat too slender grounds, this is one of the rare instances in law proceedings in which it is not easy to say what harm can arise. Who suffers? The public, or the family, or other relatives, or the party's affairs, or the party himself, or the dignity of the law? Not one of them. They may, and will, and often do suffer from too lax, but never from too strict an application of the practice which it is the object of the preceding observations to recommend."

Dr. Christison, in conclusion, offers the following suggestions applicable to Scotland:—

"*In the first place*, It is by no means necessary, in any legislation which may be thought advisable, either to define this disease, or even to mention it. To the already settled opinion of the medical profession, and to the growing conviction among the sheriffs of counties, and other law officers who are brought directly in contact with it, may be safely left the farther recognition of it as an insanity requiring treatment as such.

"*Secondly*, It ought to be made lawful for the nearest relatives to send the inveterate drunkard—somewhat according to the form in cases of ordinary lunacy, viz., under certification of two medical men and warrant of the sheriff—not to an asylum—but to such an establishment as that on the island of Skye. I do not mean that all such establishments must command equal advantages with that of Skye; but the nearer to it in that respect, so much the better. Especially, however, is it essential that there should be ample space for free and safe exercise and amusement; and, therefore, that no dealer in strong drink should be within easy reach; and where an establishment has been set down in a place possessing that exemption, it ought to be not lawful for a bench of justices, with perhaps a spirit-dealer or two among their number, to license, as I have known done in circumstances somewhat analogous, a vendor of wines and British spirits within convenient distance.

"*Thirdly*, All such sanatoria should be licensed by the sheriff of the county, on proof that the appropriate conditions will be secured, and under his approbation of the main rules of management; and they should be visited from time to time by the sheriffs and lunacy inspectors.

"*Fourthly*, When any one is sent to such an establishment, he ought not to be dismissed for less than six months, except for special reasons, satisfactory to the sheriff,—it being well ascertained that no man was ever effectually broken of the habit of excess in a shorter period. After that, let him be dismissed, if the relatives and the proprietor of the establishment be satisfied of the probability of good conduct. If they are not satisfied, the sheriff's consent should be necessary.

"*Fifthly*, The proprietor of such an establishment should have the right of ordering any inmate who seriously infringes the fundamental rules to be confined to his room—or the immediate precincts of the house—for a week; such order to be intimated to the sheriff, who may visit, or order a visit, should he see cause. And the inmate should be removable into an asylum on easy con-

ditions, when circumstances render treatment in the sanitarium inadequate, and the more severe restraints of an asylum indispensable.

"Sixthly, When an ungovernable drunkard is sent to a sanitarium, it is by no means necessary in all cases that he should be entirely deprived of the management of his affairs. But it would be of moment that he should conduct them only with advice of one nominated for the purpose by the sheriff, as soon as possible after his admission. Should that arrangement prove inadequate, it will be left to the relatives to sue for the appointment of a curator on the ordinary footing.

"As the present propositions only contemplate the treatment of those whose own means, or whose relatives, will defray the cost, it is unnecessary to provide for the erection of sanatoria. They will arise fast enough through private enterprise under the required modification of the recent Lunacy Act."

Nephalism, the True Temperance of Scripture, Science, and Experience. By JAMES MILLER, F.R.S.C., Surgeon in Ordinary for Scotland to the Queen, and to H.R.H. the Prince Consort. Glasgow: Scottish Temperance League. 1861. pp. 213.

This is another of Mr. Miller's brilliant works in the service of Temperance. The substance was originally delivered in the form of lectures to the students of the University of Edinburgh. The title is derived from "νηφω, I do not drink wine or strong drink; νηφαλιος, without wine or strong drink; νηφαλισμος, the condition of being without wine or strong drink, or true sobriety." We heartily commend the work to all persons young or old.

The Present State of the Medical Profession in Great Britain and Ireland, with Remarks on the Preliminary and Moral Education of Medical and Surgical Students: a Book that will be found Helpful to Medical Students, and the Parents and Guardians of Young Men, and of General Interest to the Members of the Medical Profession. By WILLIAM DALE, M.R.C.S., L.S.A., Undergraduate of the London University, &c. London: A. W. Bennet. 1860. pp. 70.

A sober, thoughtful pamphlet, the object of which is best expressed by its title-page.

The following reprints lie on our table:—

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FOREIGN MEDICO-PSYCHOLOGICAL LITERATURE.

OUR Retrospect of current Medico-Psychological Literature will embrace the following subjects :

1. The Responsibility of Epileptics.
2. Mental Hyperæsthesia.
3. Cysticercus Cellulosæ in the Brain.
4. On a peculiar Lesion of certain Nervous Centres.
5. On the production of Cerebral Diseases by the Atmosphere of Cafés.

1.—*The Responsibility of Epileptics.** By M. BAILLARGER.

THE question of the responsibility of epileptics appears to offer several points worthy of interest, and I propose to submit, as MM. Devergie and Tardieu have already done, some considerations regarding this question.

M Trousseau has only spoken in his paper of sudden impulses leading to homicide and suicide, of that which is generally described under the denomination of transitory madness. MM. Devergie and Tardieu have also confined themselves to this transitory madness. I do not wish to enlarge the bounds of this discussion, but there is, however, one point besides transitory madness which appears to me to merit examination. I refer to the mental condition of certain epileptic patients who, without being insane, present, nevertheless, in relation to the intellectual and moral faculties, certain special characteristics which it is impossible not to attach to their malady. These characteristics, although they do not constitute a state of madness, ought not the less to be taken into serious consideration when it concerns us to form a judgment on actions imputed to epileptics.

I commence by that which bears the mark of transitory madness.

M. Trousseau has very clearly stated his opinion on this question.

When a man, says he, commits a murder upon a sudden impulse and without motive, if that man have not previously shown symptoms of madness, and if he were not in a state of intoxication, his action should almost always be explained by the existence of epilepsy.

* This discourse was intended to be delivered from the Tribune of the Academy of Medicine at the sitting of 19th of March last, when the discussion on epilepsy and cerebral congestion raised by the paper of M. Trousseau was suddenly brought to a close.

This doctrine, if demonstrated, would assuredly possess great importance in legal medicine.

There are certainly cases of transitory madness very difficult to judge of, and what an assistance it would be to prove that the patient was really suffering from epilepsy.

I will only cite one example.

A vinedresser in the neighbourhood of Lyons was suddenly seized with a fit of shivering. He took up a mattock and killed three of his children who were near him in the house. A hundred steps from there he also killed his wife and his last child. Having accomplished all these murders he went and gave himself up.

This man was not intoxicated; he had never previously evinced signs of madness; there was no apparent motive to explain his action. He came, therefore, within the conditions indicated by M. Trousseau. He ought to be epileptic.

M. Bottex, the physician charged with the examination of the vinedresser, discovered that he had experienced vertigo and giddiness some days before the event. Besides this, he was sad, melancholy, and appeared to have had some ideas of suicide. Other testimony established that he was much attached to his wife and children.

The case then appeared most simple, and it seemed that transitory madness ought to be admitted without difficulty. But here a witness came forward to speak to a strange proposition which the murderer had held ten months before. He had said that a man who should kill his family would get off with a few months' imprisonment, because the physicians would make him out to be mad. In addition to this he had remarked since his arrest that one of his children having survived its mother some hours, became her heir, and that he himself was heir to this child; his wife's property ought, therefore, to come to him.

Need I speak, gentlemen, of the doubts which then arose in the physician's mind? All result became questionable, and in the Report presented to the magistrates, the existence of an access of transitory madness was only presented as a simple probability.

The murderer was condemned to death, but the punishment was commuted for that of penal servitude for life.

Suppose, gentlemen, that in a case so embarrassing one had discovered epileptic vertigo, what light would this fact have thrown on an action apparently so inexplicable?

I can only repeat, then, that the doctrine of M. Trousseau, if it could be demonstrated, would be one of very great importance in legal medicine; but at present this doctrine is without foundation. There are many scientific observations of transitory madness which appear completely foreign to epilepsy. M. Tardieu has cited several which are very remarkable, and I do not think I need insist on a point which has been so well handled.

There exist, then, at least, two species of transitory madness; the one connected with epilepsy, the other totally independent of that malady. It remains to inquire if there are, between these two species, any differential characteristics which would permit of their being distinguished. It will be understood that if these characteristics existed

the medical jurist might avail himself of them in certain cases, in order to establish, at least, the probable existence of epilepsy, which it would not otherwise have been possible to discover.

For some years past, laudable efforts have been made to assign special characteristics of epileptic madness. It has been demonstrated that this species of madness has, up to a certain point, its proper physiognomy.

Nevertheless, the data furnished under this head by MM. Aubanel, Delasiauve, Jules Falret, and especially by M. Morel, scarcely seem to me sufficient to be of service in distinguishing the transitory madness of epileptics from the same disease as exhibited in persons not afflicted with epilepsy.

It is known, for instance, that epileptics preserve no recollection of their accesses, and the loss of memory has been indicated as a symptom proper to epileptic madness. This sign might be important, but it cannot possess any utility for the present purpose, because it exists where transitory epileptic madness is wanting, and where the madness is independent of epilepsy.

There are in Marc's work four observations in which the patients had lost the recollection of their access. None of these patients were epileptic. All the four had had an access of transitory madness with homicidal impulses.

On the other hand, you have heard M. Devergie relate a curious observation, borrowed from Moreau (of Tours), and in which the patient preserved the memory of his access, although tainted with epilepsy. Georget cites the fact of an epileptic, who, seized with a sudden fury, attacked every one he met, and killed three persons. Such was the terror he inspired, that it was believed impossible to arrest him without shooting him. Georget adds, that this patient perfectly remembered the murders he had committed.

It does not appear, then, at present, that we ought to account the loss of memory as sufficient to warrant us in referring certain cases of transitory madness to epilepsy.

The best argument which, as it appears to me, we can invoke in favour of the extension which M. Trousseau wishes to give to epilepsy in its relation to transitory madness, is the facility with which nocturnal attacks, and, above all, simple vertigo may pass unperceived.

I have had under my care a lady of the south, who had been married, being epileptic, without any one being aware of it; besides, it is well demonstrated that there are maladies which only have accesses at extremely long intervals; if these attacks come on during the night, the malady may remain completely unknown.

Let us suppose the case of homicidal fury succeeding one of these isolated accesses, how difficult would it be to avoid error in such a case!

The following is an observation of this kind, which appears to me to possess great interest, and which I have no need to recommend to the attention of M. Trousseau.

A councillor of a town in Germany was seized with a sudden fury in the middle of the night; he attempted to kill his wife, and to

throw her out of the window. She struggled for half an hour, and the fury of her husband was then appeased. He appeared exhausted by the efforts he had made. Some instants before this access of the fury, the respiration of this patient became stertorous; his wife, alarmed, wished to relieve him, and it was then that he attacked her.

It is a singular thing that Marc, who relates this observation, does not appear to have suspected the existence of epilepsy. The stertorous breathing, followed by fury, did not awaken in his mind any suspicion of an access; he wrote a few pages further, in a chapter on the transitory madness of epileptics, without appearing to dream that this fact belonged to it; and nevertheless is it not infinitely probable that this sudden fury cannot be accounted for otherwise than by a nocturnal attack of epilepsy? One point very important to remark is; that the patient, during fourteen years afterwards, exhibited no other sign of madness.

Here, then, is an attack of epilepsy totally isolated succeeded by homicidal fury. If the murder had been consummated, if the wife of the patient had not been able to reveal the fact, so important, of the stertorous breathing, would not the error have been almost inevitable?

M. Dumesnil, chief physician of the asylum of Quatre-Mares, at Rouen, cites the observation of a soldier who was brought before a court-martial for grave insults towards his superiors, and it was not till long afterwards that he was discovered to be subject to epileptic vertigo.

These facts, and many others, may be quoted to prove that transitory madness is more often connected with epilepsy than has hitherto been supposed.

This is, I believe, the sole conclusion which can be drawn from this discussion, besides the too absolute doctrine of M. Trousseau.

I pass to the second point which I proposed to examine, that is to say, the influence of epilepsy on the intellectual and moral dispositions of certain epileptics not insane, and to the consequences which the medical jurist may draw from them.

The patients of whom I wish to speak present special traits which are remarked by all authors on the subject. "They have," says Esquirol, "exalted ideas; . . . they are very susceptible, irascible, obstinate, difficult to please, capricious, odd; they all possess some peculiarity of character."

M. Calmeil remarks, that all epileptics not yet insane are very irascible, very impressionable, and disposed to false interpretations.

That, says he, which scarcely moves a man of ordinary susceptibility causes to them a feeling of profound trouble.

M. Delasiauve indicates the same traits in the character of certain epileptics; he concludes that this condition ought not to be considered a real disease, but an extra-physiological disposition.

I think I need not make more references. All authors are, in fact, agreed in admitting this fact, that epilepsy, before leading to complete insanity, produces very important modifications in the intellectual and moral condition of certain patients; these sufferers become susceptible, very irritable, and the slightest motives often induce them

to commit acts of violence: all their passions acquire extreme energy.

It remains to examine up to what point we ought to pay attention to these special dispositions, when these epileptics are called to answer acts more or less serious.

I am unable to quote the opinion of any jurist upon this point; but besides epileptics, there are other subjects who without being insane present, nevertheless, intellectual and moral dispositions such that one cannot avoid explaining the anomalies which they exhibit otherwise than by a vicious organization.

The following is the opinion of a magistrate who has given great attention to mental diseases, in regard to the latter class of cases.

Whenever, says he, an hereditary germ or a purely native disposition renders the exercise of reason more difficult to a person whom we account of sane mind, what are we to conclude? That the struggle ought to be greater on his part to overcome these organic obstacles which he is always certain to conquer, so long as his personal power subsists, and he is determined to use it. . . . It is as certain in physiology, as in philosophical jurisprudence, that we ought not to seek for causes modifying free-will in these inequalities of moral and intellectual character. It is of little importance that the cause may be fatal and hereditary; so long as the germ hereditarily transmitted be not developed in a way to engender insanity, the power of the will is sustained, and in this case the individual is accountable for all actions.

Are we to apply to the epileptics of whom I have spoken so absolute a rule?

This would be, as it appears to me, to exhibit excessive severity.

Without doubt these epileptics are not insane; but if the special condition which has been developed in them by disease does not entirely destroy free-will, we may, I think, without danger to society, acknowledge that it does in many cases modify it.

I believe, then, that the duty of a physician, when it concerns him to consider the responsibility of an epileptic, ought to consist often, where insanity does not exist, in making plain and apparent the influence of the disease on the intellectual and moral dispositions of these patients. At times he will have to remark a commencement of weakness of intellect, as was the case with Lecouffe, accused of assassination, whose case was examined by Georget: more often he ought to bring into relief that irritability, those violent passions, that suspicious character, of epileptics, the exaggeration of their sentiments—in a word, all those marks which, without constituting insanity, nevertheless place these patients beyond the common rule.

It will often happen that he may thus obtain for the epileptic, not absolution but mitigated punishment.

Whatever may be the differences in theory, there are facts whose influence it is impossible not to acknowledge. An epileptic not insane commits an attempt to murder; premeditation is perfectly demonstrated; the murderer has designedly provided himself some days before with the knife which he has used. M. Boileau of Castelnau attempted to obtain the acquittal of the patient: in this he did not

succeed; but the punishment was mitigated two degrees, and the epileptic, though not insane, was only condemned to six years' imprisonment.

How many similar examples might we not cite of crimes committed by men regarded as reasonable since they have been condemned, but towards whom the penalty has been reduced because of doubts raised as to the plenitude of their reason!

I was once employed to draw up a memorial for a man who had attempted to assassinate a magistrate by striking him three blows with a poignard. Premeditation was well established. The question of insanity was raised, and there was this remarkable fact, that the six physicians called to give successively their opinion on the mental state of the accused, divided themselves as follows:—Two considered him insane; two considered he was not; the two last, after three months' examination, made a long report, but refused to pronounce him either sane or insane.

The magistrates decided that this man was not insane, since they condemned him; but for this attempted assassination, made with premeditation against the person of a magistrate, the punishment was only six years' imprisonment.

To resume: it has appeared to me useful to recal:—

1. That besides declared insanity, there exists with certain epileptics a special moral and intellectual condition.

2. That the medical jurist ought, in many cases, to apply himself to make apparent the principal traits which characterize this condition, to extenuate, at least as much as possible, the responsibility of the sufferer.—*Annales Medico-Psychologiques*, Avril, 1861.

2.—*On Mental Hyperæsthesia.* By JOHN ORDRENAUX, Professor of Medical Jurisprudence.

THE following suggestive observations occur in an interesting Lecture delivered by Professor Ordreiaux before the Students of Columbia College, New York:—

“I wish now to speak of a condition of mind, often predisposing to hallucinations, of which the authorities make no mention, although it is very common, and sometimes even dangerous in its character. It is an exaltation of, or exaggeration in, the rapidity of mental processes, due to the influence of persistent tension upon the brain. As you will naturally infer, it is the unwelcome attendant upon all active minds when overworked. I shall make no separate allusion, at this time, to the probable influences of narcotics in assisting to produce, or to exaggerate when present, this state of the intellect. As I am making a simple psychological inquiry into a form of disorder, I shall confine myself to the essential causes producing it, and shall not venture upon any physiological disquisition into the remote and correlated sources of its origin. We can all agree upon the fact—whatever we may think of its causes—of the existence of a species of mental disturbance, born primarily of fatigue, exhaustion, or prostration; and which, with

your permission, and for want of any other name, I shall call a state of *mental hyperæsthesia*. This is the state of mind in which one finds himself whose mental faculties have been strained to their utmost tension for a great length of time. The result of a long and unabated fixedness of attention upon any one train of thought, is speedily to exhaust the mind; and just in proportion to the degree of volitional effort expended, will there ensue rapidity of exhaustion. The mind, at such a time, although greatly fatigued, is not disposed to quiescence, but continues to oscillate under the reflex influence of its original stimulus.

"This, of itself, is not a condition of ill-health, if it can be speedily removed. So long as the strain does not exceed the recuperative powers of the organ thus overtasked, the shock is not immediately dangerous. But we must remember that this unnatural stimulation of a function exhausts the tone of the organ performing it, in advance of the effects of age. So that, with the mind as with the body, we can preserve it in vigour up to a very late period of life, if we will only use it as not abusing it. And I may state, in passing, a curious illustration of this truth in the fact that, at this time, the statesmanship of England is in the hands of men over seventy years of age: while in this country no man is deemed an available candidate for either judicial or political office who has passed the scriptural limit of human longevity. Now a state of mental hyperæsthesia clearly borders upon abuse of the intellectual powers; nor can we wonder, therefore, at the train of melancholy effects to which it gives rise.

"In this condition of things the brain is inordinately active; its blood-vessels are greatly dilated, its whole substance consequently enlarged. It presses in all directions upon the skull, which seems hardly of a size to contain it; and when this cerebral plethora is continued for weeks and months, who can marvel that men in the very maturity of age, and apparently strong enough to work over their desks for nine hours a day, should suddenly drop paralysed—become victims to hallucination and insanity, or, worse still, fall into apoplexies. It is not asserting too much to say, that if our time-pieces were kept wound up to a similar pitch of tension by constantly turning the key, their mainsprings, although made of steel, would not last a month! Yet this is the mental status of many professional men, particularly in large cities, where the unremitting pressure of business, and the fever of competition, stimulate them to unnatural efforts. Persons often overwork their minds unconsciously, because, through the compensating influences of nature, the external effects of the injury are for awhile concealed, and not until some unmistakeable evidence looms up across the intellectual horizon is the offender made aware of his wrong-doing.

"The majority of professional men toil far into the small hours of night and then retire—to sleep? scarcely any, if at all; but only to think over and over again the duties of the morrow, until a hazy forgetfulness, not deserving the name of slumber, steals over the still occupied brain, and leaves it to finish in dreams the disconnected fragments of daily business. Need we ask what is the consequence of

this mode of life when protracted? Everything shows us that Nature's laws are never violated with impunity, and slow-footed Justice, halting and lame though she may be, rarely fails to overtake the retreating criminal. In those individuals who habitually overtask the brain, we shall find manifestations of that form of hallucination which is the offspring of intensified and protracted thought. It is true *hallucinatio studiosa*, and the period at which it develops itself will depend upon certain physical causes, not necessary to be mentioned here. Let it suffice to say, that these hallucinations are generally preceded by inability to sleep *soundly*, and this tendency to insomnia once established, readily passes into that of *coma vigilans*, a state productive of exquisite irritability. When the brain is long robbed of sleep, it loses both the knowledge of, and the ability to, sleep; so that it requires to be re-educated, as it were, into this aptitude. During this condition of vigil it reacts upon the stomach, and this again upon the brain, so that we now have two foci whence nervous irritability can be radiated and interchanged. The famous Laurence Sterne was once in this condition for several months, and Martin Luther, as the result of his protracted mental labours, was often visited by a hallucination that the Prince of Darkness stood before him, and on one occasion went so far in believing it as to throw his inkstand at him. General Rapp tells us that once, desiring to speak with the Emperor Napoleon, he entered his cabinet unannounced. He found him in so deep a reverie that his entrance was unperceived until he intentionally made a noise. Napoleon then recovered, and pointing to the ceiling said: 'Look up there! Do you not see it? It is my star! It is beaming before you. It has never deserted me! I see it on every great occasion.' Dr. Johnson, too, whose mighty intellect could endure a superhuman amount of labour, was the victim nevertheless of hallucination, and one of the most superstitious men of his time. Rare Ben Jonson was also similarly visited, and Andral, the great anatomist, was pursued for a long time by the image of a child, which he had most critically dissected. Leuret, the philosopher, himself a psychologist, was greatly annoyed by visions which he could not rid himself of. And I have several instances noted among my own observations of similar facts. A friend of mine, who is the president of a bank, and a shrewd financier and economist, is exceedingly annoyed by the presence of a bottle of sarsaparilla, which is always spouting its contents before his eyes. The moment he fixes his attention closely upon any object the bottle disappears, but on releasing the mind from this contemplation the bottle returns. Yet none of these men whom I have mentioned were insane, none would have been disqualified at law either civilly or criminally. On the contrary, every one would pronounce them blessed with strong reason. Theirs were cases of mental dyspepsia. I am inclined to think that, in our country, the very laws of business, of society, of education—in a word, the genius of our institutions—favours, and, I may say, forces us into, a preternatural activity of mind. As slowness and deliberation of action are regarded as marks of mental incapacity, so the premium and the prize are assigned to the opposite extreme, and the man in self-defence

is obliged to be 'fast.' "—*American Journal of Insanity*, April, 1861.

3.—*On Cysticercus Cellulosæ in the Brain.* By DR. SNELL.

THIS singular parasite is oftenest found in the muscles and in the connective tissue under the skin; but the serous membranes, the liver, spleen, kidneys, eyes, and lymphatic glands sometimes also serve it as a resting-place. It is rarely found in the brain, but there (while in the other organs, with the exception of the eye, it is usually attended with no ill consequences) it usually proves the cause of the most serious symptoms, and of death itself. Dr. Snell of Hildesheim relates the following case:—A man, æt. 24, living in the country, and engaged during the winter in slaughtering pigs, fell ill, April, 1857, with intermittent fever, accompanied by symptoms of great congestion of the head and chest. Somewhat relieved by large doses of quinine, relapses occurred, and he did not completely recover his health. In the course of the summer of 1857, the patient suffered from periodical cephalalgia, which implicated especially the occiput, and kept increasing in severity. There were also weakness of vision, with enlarged pupils, singing in the ears, vomiting, anxiety, and a sense of want of power in the limbs. His mind was frequently somewhat disturbed, and towards the end of September maniacal excitement was suddenly set up. After remaining in this state of exaltation for two or three days and nights, he slept for twenty-four hours, and awoke with his consciousness clear, but without recollection of the attack. His pain in the head and other symptoms of cerebral disturbance returned, and during the next two months he had frequent returns of the paroxysms of delirium, and by the end of the year his mental disturbance had become continuous, and the paralysis had much increased. The appetite and nutrition, however, remained in a normal state. He was brought to the asylum at Hildesheim on the 27th December, being scarcely able to walk and almost blind. His pulse was 96, and he complained of violent pain in the forehead. After seeming at first to improve somewhat, he died on the 29th. At the autopsy, his brain, which weighed 54oz., was found to contain numerous small cysticerci, which, under the microscope, were recognised as *cysticercus cellulosæ*. Five of these were attached to the inner surface of the dura mater; but all the others were met with in the grey substance of the organ, and not only in the cortical substance, but wherever the grey matter was found, as within the ganglia and commissures. The greatest number were found grouped together here and there in the cortical substance of the hemisphere. The optic thalami and corpora striata were also thickly beset with them. In the cerebellum only four were found, and they were entirely absent from the medulla oblongata. The white substance nowhere formed the nissus for the cysticerci, although they sometimes pressed into it when they had reached the limits of the grey substance. The entire number amounted to 400, they being for the most part fully developed, containing a transparent fluid. They

had, however, in part degenerated, the fluid being yellow, turbid, or puriform. They were usually of the size of a small pea, but several were less than millet seed. The largest did not exceed the size of a large pea. In all other parts the brain was quite normal, nor did it, even in the vicinity of the cysticerci, exhibit any signs of inflammation or other diseased process. The arachnoid also was quite transparent. Notwithstanding a careful search was made for them, no cysticerci could be detected in the muscles, connective tissue, or elsewhere. Nor was there, indeed, any pathological condition found in any other part of the body : so that the symptoms and cause of death in this case would seem to be solely referable to the mechanical compression exerted by the cysticerci. In this case, it is remarkable that no convulsive movements were observed : and the occasional cessation not only of the symptoms of mental disturbance, but of the paralytic manifestations, is of interest.—*Allgem. Zeitsch. für Psychiatrie*, Band xviii. Heft i.

4.—*On an Organic Lesion of certain Nervous Centres, not previously recognised.* By DR. A. JOIRE.

THE organic changes in the encephalon, which are met with amongst those of the insane who succumb under the influence of paralytic dementia, have of late years been the subject of numerous and important researches. Great difference of opinion nevertheless exists amongst men of science, as to the degree of importance to be attributed to these various lesions in the production of general paralysis. It is well known that this affection was scarcely studied until our own day, otherwise than as a grave complication, and the most grave of all which aggravate insanity. It is only in later times that the facts respecting progressive general paralysis have been observed, as manifested beyond the region of its coincidence with insanity.

This habitual association of two morbid forms has led the authors of these researches to consider the same parts of the encephalic apparatus as being by their lesions the common determining cause.

One who has devoted himself more particularly to the study of general paralysis, M. Calmeil, considered inflammation of the grey substance of the convolutions as the cause both of dementia and paralysis ; he considered this affection to be anatomically a diffuse chronic peri-encephalitis. More recently, others have admitted, as the anatomical characteristic of paralysis, the softening of the middle layer of the cortical substance of the convolutions, both resulting from an inflammatory state. Another opinion maintained by MM. Delhay and Pinel-Grandchamp, and reproduced more lately by M. Foville, was that the intellectual derangement was connected with changes in the grey substance, and the disorders of movement with lesions of the white substance of the brain. Here we perceive arises the idea of a distinction between the organic seat of the two morbid conditions. But we remark that the cause of the double phenomenon is referred to the brain alone. The researches of modern physiology, however, do

not permit us any longer to connect the general disorders of motion manifested in general paralysis with lesions of the cerebral hemispheres.

These organs are acknowledged in our day as the material agents of intellectual and instinctive acts; while the phenomena of sensibility and motion belong to the encephalon and other parts.

Our researches relative to the organic changes proper to general paralysis must therefore be based solely on the experimental data of modern physiology, and especially on the distinctions established by M. Flourens between the respective functions of the different parts of the encephalon; and the cerebral hemispheres should henceforth be considered as beside the question.

Such were my impressions, when, recalling the numerous organic changes verified as belonging to paralytic dementia by persevering microscopic researches during more than thirteen years, my attention was vividly fixed in a special lesion seated beyond the cerebral hemispheres, which for nine months I had never failed to observe in general paralysis, and which I had not met with in paralytic lunatics.

This lesion has its seat on the internal surface of the cerebellar ventricle (fourth ventricle), and consists in the presence of a *seemingly gelatinous transparent layer* of variable thickness, amounting sometimes to a millimetre; *the surface of this layer is covered, especially on a level with the anterior and inferior coat of the ventricle, with a considerable number of salient papillæ or granulations* exactly analogous to the pimples of the skin manifested under the influence of cold, and designated by the name of goose-flesh.

I have observed that in subjects who succumb at an early period after the appearance of general paralysis, this additional layer is very thin, the granulations of the surface infinitely more numerous and smaller, and their aspect gives the idea of scattered grains of sand, or, better still, the particular alteration of the palpebral mucous membrane indicated under the name of granulations of the conjunctiva. This lesion, which I have called *granulations of the walls of the fourth ventricle*, is constant in general paralysis, and has no other seat.

I have carefully observed, in my microscopic researches, the walls of the lateral ventricles and those of the third ventricle; I have not met with anything there of a similar nature.

I do not propose to raise here the important questions which might be evolved in the study of the relations between the lesion I have just pointed out, and the symptomatic manifestations which I attach to it; neither do I propose to examine whether this lesion may be manifested in the encephalon separately, or whether it is connected with the previous existence of a more general alteration of the brain, whence may depend the disorder of the intellect: a complete work embracing the study of these various questions, accompanied by observations made with reference to this subject, will shortly be communicated to the Academy.

My object at this moment is to point out an organic change peculiar to general paralysis to which, up to the present time, attention has not been directed, and to solicit of my alienist colleagues researches

which I feel sure will prove confirmatory of my assertions.—(*Annales Medico-Psychologiques*, Avril, 1861.)

5.—*On the Insalubrity of the Atmosphere of Cafés and its Influence upon the Development of Cerebral Maladies.* By DR. LEGRAND DU SAULLE.

Dr. L. du Saulle has arrived at the following conclusions, as the result of certain researches on this subject:—

1. Cafés such as they are at present arranged are far from being sufficiently ventilated, and for this reason are unhealthy resorts.

2. Amongst a great number of those who are assiduous frequenters of cafés, we may observe, after a time which it is extremely difficult to define, a sort of special intoxication; peculiar troubles disturb the economy, and at length a marked tendency to cerebral congestion manifests itself.

3. The accidents to which allusion is made are in no way dependent upon alcoholism; they differ from it in much. They are besides met with in sober men, who make the estaminet a place of meeting for business or pleasure, and not a place for drunkenness.

4. What tends to prove the special character of this variety of congestive poisoning, is that all the phenomena, especially in the first and second stages, disappear spontaneously shortly after the cessation of the cause.

5. All the acute or chronic maladies which affect the brain, and the etiology of which remains impenetrable, may about once in ten cases have no other cause than a daily sojourn for a number of years, for one or more hours a day, in the hot and vitiated atmosphere of cafés.

6. The general paralysis of the insane commencing most frequently in congestion, and the atmosphere of cafés conducting often in the long run to this primordial phenomenon, there is reason to ask if this circumstance might not explain, up to a certain point, the very great frequency of general paralysis in men and its rarity in women.

THE MEDICAL PROFESSION OF SCOTLAND, AND THE LUNACY ACT OF THAT KINGDOM.

ON Friday, the 7th ult., an important meeting of the medical profession of Scotland was held in the Hall of the Royal College of Physicians, for the purpose of considering the propriety of obtaining some modification of the provisions of the law now affecting the insane. Among those present were:—Dr. Alexander Wood, F.R.C.P.; Dr. Douglas Maclagan, P.R.C.S.; Drs. Andrew Wood, Newbigging, Combe, Halliday Douglas, Seller, Maclagan, Peddie, Hamilton, Coldstream, Andrew Thomson, Keillor, John Brown, Charles Bell, J. Gairdner, Zeigler, W. T. Gairdner, John Struthers, Charles Wilson, Huie, Fairbairn, Wright, Scoresby-Jackson, Burt, Brodie, Jamieson, Myrtle, Malcolm, Murray-Thomson, Johnston, Sibbald, Benjamin Burt, Omond, H. Johnston, W. Brown, Cruickshank, Pridie, R. P. Ritchie, J. Coxe, T. Balfour, Stewart, Burn, and Somerville; Messrs. B. Bell, Carmichael, and A. Dickson; Dr. Smith, Lasswade; Dr. Sanderson, Musselburgh; Dr. Brown, Melrose; Mr. Mackenzie, Kelso; Dr. Brodie, Morningside; Dr. Craig, Ratho; Dr. Hislop, East Linton, &c. &c.

On the motion of Dr. NEWBIGGING, Dr. Alexander Wood, in the absence of Professor Christison from indisposition, was called to the chair.

Dr. ALEXANDER WOOD, after expressing his regret for the absence of Dr. Christison and other gentlemen, who were prevented from being present, said that he believed the object of this meeting was pre-eminently one for the good of the public, and more especially of that unfortunate class of the public who required medical treatment as persons more or less deprived of reason. There were two points of view in which they could look at a question like this. One was the point of view which the public were too apt to take, the other the point of view which the medical profession necessarily took, and which he trusted in this meeting would receive a prominence and attention which it was not likely to receive in a public meeting or from the Legislature. If they looked to the reports of Parliamentary Committees—of Parliamentary Commissions he would speak immediately—if they looked to the various legal writings on insanity—if they took the general impressions of the public, as they could gather them in conversation, or as they could read them either in the imaginative pages of the novelist, or in the dry details of legal authority, they would see at once that there was one idea predominant with the public that the great object of all legislation in regard to lunacy should be this—to protect the patients as much as possible from the chances of being unnecessarily immured in asylums, or of having their liberty tampered with in any way. But they, as medical men, looked at the question from the other side, and regarded it in a very different point of view. They must look upon these unfortunates as afflicted with a disease, perhaps the most serious to which the human frame was subject. They must look upon them as afflicted with a disease which statistics prove indubitably to be one of the most curable acute affections, if taken at an early stage, to which man is subject; and one of the most incurable, if neglected in its early stage; and, therefore, their great object was to protect lunatics from the affliction incident to the disease, and place them in the condition most favourable to their cure. Thus there were two antagonistic principles, which were continually struggling the one against the other in all discussions on the management of lunatics—the idea of the public and of legal functionaries that lunatics required protection against medical treatment, and the natural idea of the doctors that lunatics required medical treatment, and ought to have it as early as possible. There was another peculiar element which came into consideration in the treatment of lunacy. In the first place, no lunatic almost admitted his unfortunate condition; and, in the second place, the treatment of lunacy required a certain amount of seclusion, a certain amount of deprivation of liberty which the law was naturally jealous of allowing, and which he would not wish to see the law less jealous of allowing than it actually was. The great object, then,

which the Legislature should have in view in framing regulations, was to afford the utmost protection to the liberty of the subject compatible with the early treatment of the disease. They found from statistics that of the lunatics placed under treatment within the first three months after the attack of the disease, the proportion of recoveries were as four to one ; after the first three months, the proportion fell from nine to one ; and after twelve months, the recoveries were found to be only one in four. So far advanced were some Governments in the knowledge of these facts, and in acting on them, that in the Grand Duchy of Baden gratuitous treatment of lunatics is offered in an excellent asylum to all who apply within the first six months. Speaking, as he did, in a meeting of medical men, he need not urge on them that there was no way of treating the great majority of cases of lunacy at all to be compared to the treatment of it in places appropriate for the purpose. Every writer on insanity had contended for this ; and knowing, as they did, the causes of insanity, and how it was aggravated and kept up, they could easily see that it was essential that the patient should be placed in such a position as to be free from all interference with his comfort, or from the despotism of his own temper and disposition, and placed in the condition most favourable for cure. As they all knew, in insanity both body and mind were affected ; and after rude medicine had done its part in removing the complaint of the body, it remained for them by moral treatment to do what they could for the restoration of the mind. It was a singular fact, as illustrating the difference between lawyers and medical men on the subject, that while a few years ago a royal commission was charged with the investigation of the subject of lunacy in Scotland—and charged, as he believed, to make out a case for legislative interference—they could not, on their own responsibility and knowledge, point to any one case of an individual being confined in an asylum whose health did not absolutely require that confinement, but they did point to hundreds of cases where individuals, from the legal impediments thrown in the way, were not confined in asylums who ought to have been confined. They pointed to the case of lunatics undergoing a life of wretchedness, misery, and domestic restraint, under the worst possible conditions for cure ; and while they could show very little of improper treatment of lunatics in asylums, they could show a great deal of very improper treatment of lunatics in their own houses or in the wretched places to which their families had consigned them. What was the fact ? In every county in Scotland where lunatic asylums of any note existed, and where there were facilities for removing patients to them, very few were left to be treated in their own homes, but where they were at a distance from asylums, where facilities were therefore diminished, these unfortunates were left to the domestic management, and the aggravation of their disease was the consequence. The necessary inference was that the more they multiplied impediments in the way of removal to an asylum, the more they increased the chronicity of the disease of the wretched patients, and multiplied the very evils it was their object and intention to cure. Another striking fact which no one could read the evidence of the Scotch Commission without noticing was this, that in referring to the duties devolving under the old Act on the College of Physicians, when they had to receive returns from the sheriffs of counties in regard to lunatics confined in these counties, and had to nominate three medical men from whom the sheriff chose a medical visitor who accompanied him round the asylums—while no one could read the report of that Commission without seeing that there was most ample evidence that the medical men did their duty to the best of their ability, as indeed the minutes of the College of Physicians showed, for they had to complain again and again of the irregularity of the returns—there was the most ample evidence to show that the sheriffs did not license houses at all proper for the reception of lunatics, but sometimes licensed houses notoriously improper ; and in one of the most important counties in Scotland the Commissioners found that any man who chose to pay for the licence would receive it, whether his house was fit for the reception of lunatics or not. He argued from this that the legal treatment of insanity was not always the most perfect ; and as to the medical men, they had, he thought, shown that they were willing to do, and had always done, their duty in all respects as they ought to have done in this matter. Their object was to discover how they could best remove the present restraints and interference with the proper and early treatment of lunatics, without at the same time trenching on the liberty of the subject, or giving cause for persons to suspect that it was within the limits of

possibility that they or their relatives should be confined unnecessarily in an asylum. He would say this, that the more they created suspicions that the highly-educated and accomplished medical men who opened asylums for the reception of lunatics were persons capable of turning this into a matter of trade ; or persons capable of all the enormities that novelists had pictured, and legalists had imagined in regard to lunatics—the more they created suspicion by unnecessary legal forms and impediments, the more they increased the unwillingness of patients to go into asylums, and of friends to allow them to go. Here, then, were their propositions—asylums were necessary for the cure of lunacy ; early removal to these asylums gave the greatest possible chance of recovery ; deferred removals increased the tendency to chronicity of the disease, besides greatly aggravating the sufferings of the patient. The problem they had to solve was, how were these objects to be accomplished without throwing too loose the regulations, and allowing persons to be received or improperly detained in asylums who ought to be at large ? Dr. Wood concluded by saying that, as difference of opinion might exist as to some of the questions to be brought forward, the committee who had prepared the resolutions to be moved, desired that the utmost freedom of discussion should be given, and that any amendment on the resolutions that might be moved should receive full consideration.

Dr. DOUGLAS MACLAGAN rose to move the first resolution, which was as follows :—“That the present medical certificate is unsuitable. That it should simply bear that the undersigned medical men separately visited and examined (A. B. on such a date), and found him to be of unsound mind, and requiring confinement in an asylum. That this certificate, coming from two qualified practitioners, appears to be amply sufficient, and to require no statement of facts to be appended to it.” In supporting the resolution, Dr. MacLagan said he thought there would be very little difference of opinion in the meeting on the propriety of the change proposed in the resolution. Every one who had had occasion to sign these certificates must have found them to be troublesome to fill up—they must have found it most difficult to say what they were to put in and what they were not to put in, and also most difficult to find space in the schedule for writing what they determined to put in. The very size of the schedules showed that those who enacted that these schedules should be used intended that they should be filled up in few words. Now, it was quite possible to describe many diseases in a few words ; but the idea of giving in a line or two—where there was room for only twenty or thirty words—such an account of a case as would convey any information to any human being he held to be a literary impossibility. He had never been able himself to write one of these certificates, so that if it were put before himself by any other person, it would have been satisfactory to his own mind. It was, no doubt, satisfactory to him, because he was conversant with the patient, and was convinced that he was certifying what was true ; but that was a different thing from writing a certificate which would be satisfactory to another medical man who was not conversant with the patient. And if the certificate was not satisfactory to medical men, to whom else could it be satisfactory ? He did not think it could be satisfactory to the public mind, wherever that psychological entity might reside, and it could not be satisfactory to the authorities, whoever they might be. He did not think it was possible in the space of a certificate of that kind to convey such information as that an individual, having no other information but that which was contained in the certificate, could come to a deliberate opinion upon the nature of the case, or upon the suitability of that case for confinement. And yet that was precisely the position in which they stood ; for that form of certificate was to be put before a public functionary, and he was to judge of that. If he was not to judge of it, it was unnecessary, if he was to judge of it, it was unsatisfactory. It would be much more satisfactory to him if they were compelled to give in a full report of the case rather than the present certificate. They would then be able to give in something which would convey information, whereas at present they conveyed no information at all. The result was that, coming before the public authorities, different views were taken with regard to these cases. Sometimes the Sheriff said—“It is not my province to judge of these facts at all—I have simply to see that I have a certificate that the man is insane, and that it is signed by two respectable medical men, and I give my warrant.” Another says—“There are statements of facts before me, and I shall judge of them,” and he pro-

ceeds to do so ; and he who has never seen the patient, and who probably knows nothing upon the subject, gives a decision either in support of the certificate, which is unnecessary, or adverse to it, which is detrimental to the patient on those unsatisfactory grounds. He thought, therefore, that the present form of certificate was unnecessary, and did no good, and that the old form of certificate, which was proposed in the resolution, was amply sufficient, while, under that form, it was found that on inquiry there were no instances of parties being improperly put into asylums.

Dr. HUIE seconded the resolution, which was unanimously agreed to.

Dr. MACKENZIE, Kelso, moved the second resolution, which was as follows :—“That the period during which a person may be confined on an emergency certificate is too short, and should be extended from twenty-four hours to three days.” In supporting the resolution, Dr. Mackenzie said he must first acknowledge, on the part of the country practitioners of Scotland, several of whom he saw present, the courtesy shown them by the gentlemen who had kindly undertaken the preparation of these resolutions, in inviting them to take part in to-day’s proceedings. It was not very long since country practitioners had to be content with what was given them by their town cousins ; but they now felt better days dawning on them. As to the resolution, he did not anticipate any difference of opinion upon it, and if the necessity for extending the time granted by an emergency certificate from twenty-four hours to three days was acknowledged by urban practitioners, it *a fortiori* was necessary for patients residing at great distances from asylums. Dr. Mackenzie spoke of the exhaustion experienced by insane patients by travelling, and the necessity for some days’ rest before returning even to the state they were in before leaving home. He referred specially to his own district, stating that they had the average number of insane, and no asylum within thirty miles of them, so that it might be supposed he was earnest in moving this resolution.

Dr. CRAIG, of Ratho, seconded the resolution, which was unanimously adopted.

Dr. PEDDIE said—The resolution which I have been requested to move is the following :—“That many cases of excessive intemperance depend on disease, and constitute a form of insanity. That such cases cannot be treated without confinement more or less strict. That in the present condition of the law, such treatment is frequently unattainable. That some cases of the kind require treatment by confinement, not different from that enforced on other insane persons. That for many more a different system of treatment is desirable. That although such a system of treatment has already been established in various institutions in Scotland, into which persons are admitted with their own consent, yet it seems necessary, in certain cases, to afford the means of enforcing admission into such institutions ; and that such institutions should be licensed, subject to the jurisdiction of the Lunacy Commissioners, and conducted under such regulations as the Act may direct.” This resolution is quite a speech in itself for length, and is so explicit and complete in all its parts, that, but for public considerations, in a meeting of medical men such as this very little exposition would be required ; for all here must know the psychological aspects and bearings of what has been called the drinking insanity, termed also, whether correctly or not, dipsomania and oinomania ; and the greater number of us must have had more or less practical and troubled acquaintance with cases of it at various times in the course of our professional experience. I question if any one present entertains a doubt that this phase of excessive intemperance is, what the resolution affirms, a form of insanity—a disease of the brain and mind, however much it may seem in certain instances to spring out of a course of mere moral delinquency, or be mixed up with the vicious feelings and practices of a depraved heart. We have around us abundant examples of the ordinary vice and habit of intemperance, and of the varied ways in which it influences health and conduct. These constitute a monster evil of our country, but they fall within the ordinary limits of transgressions against nature, morality, and society, which imply responsibility and accountability ; and, therefore, the infringements of the laws of health, of social order, common decency, and religion, bring with them their respective penalties in sickness and impaired health, the censures of society, or it may be the degradation of the police barrow and cell, or the punishment of a court of law, or the discipline of the Church. But the condition which is indicated in this resolution lies beyond the boundary line of moral or religious persuasion, or of prosecution for criminal misdemeanour. It is a morbid state

of the brain which influences the operations of the mind, chiefly in the way of craving for strong drink, which no secular or sacred considerations can control ; and it is developed during a long course of intemperate habits, or exists even at an early age in consequence of strong hereditary predisposition. The transition from the habit or vice into the disease of drinking may be slow in some cases, and in thousands it never takes place at all, although the drinkers may drink often and deep—nay, although in one class of cases they may tipple all day, in another get drunk every night, or in a third, go on a ramble for days or weeks at a time. In a considerable number of instances, however, the vice passes quickly into the disease, and when such is the case we generally find that the individuals affected are of a highly nervous and excitable temperament, with perhaps some family tendency to intemperance. I believe, however, that a large proportion of insane drinkers inherit the tendency from those who were in the same condition as themselves, or were affected with *delirium tremens*, or with mental disorder in some other form. Many of the cases of this malady which I have seen have been so associated. In the very last which fell under my observation, three of the family appear to have been insane, one intemperate and subject to *delirium tremens*, and five highly nervous and hysterical. Dr. Thompson, of the Perth prisons, communicated—in the *Edinburgh Medical Journal* for April, 1858—several most interesting cases of this kind ; and I am sure that many of us present could readily multiply such melancholy illustrations. Now, it has been objected, especially by lawyers, who are apt to view the subject in the light of crime, and the clergy, who view through the dark atmosphere of sin, that although there may be no great difficulty as to the propriety of placing the very worst class of insane drinkers under legal restraint for a time, it is almost impossible to draw the line between the lesser degrees of what we doctors call the disease, and the more ordinary forms of the vice of intemperance, and they tell us, if you cannot do so, you might with legal facility, any day, in any of our large towns or cities, place in asylums some hundreds or thousands of drunkards, if there was accommodation for them. Now, I think you will agree with me in replying that we do not find it difficult to discriminate those cases in which legal interference is necessary from those in which it is not, and that all our present difficulties arise only from the want of a clear understanding of the law, and the uncertainty in its administration. In connexion with the one distinguishing feature of the disease, continual craving for, and the excessive use of, intoxicating liquors, there is the other—viz., a total loss of self-respect and self-control in gratifying the desire, and as effects from those, there is the unfitness for performing the ordinary duties, and for fulfilling the obligations of life ; also, characterised, perhaps, in one class of cases by wastefulness and extravagance ; in another, by indecent or profane conduct ; in another by theft ; in another by vindictiveness ; in another by tendency to impulsive violence, which may lead to the commission of murder or suicide ; and in all by extreme deceitfulness and lying. Such afford unmistakable features, when more or less combined, to guide us in our decisions. Then, if we come to review the history of an individual case, perhaps we may, as I have duly noticed, find in it a constitutional predisposition to mental disorder in some form, and whether or not we will learn that ordinary measures, such as moral and religious considerations and friendly restraints, had been employed, but without avail, for the security of person, or property, or family peace and comfort, or for social order. With such facts as these, we need be at no loss how to act, feeling convinced that an insanity is fully established, and that nothing short of personal control, and a humane curative treatment pursued for a considerable period of time under such control will overcome the craving for strong drink, and perhaps effect permanent reclamation. Now, legal facilities for enforcing control in this insanity, which ought to be accorded by a humane public and a wise Government, is in the present state of the land unattainable, except, perhaps, in some of the most extreme cases in which delusions exist, or which are characterised by fury ; and even in regard to such cases, the uncertainty in the administration of the law is now so great, and the chances of sufficiently long detention are so small, that medical men are becoming more and more unwilling to certify at all. Indeed, in some counties, there appears to be no chance of obtaining the Sheriff's consent, however urgent the case may be, even although there is threatened suicide or danger to the life of others alleged, should anything in the filling up of the schedule, which requires facts, be said about the unsoundness of mind being produced or distinguished by

excessive intemperance, or uncontrollable craving for intoxicating liquors. This is surely either a high degree of legal subtlety and mystification, or a very intensely morbid sympathy with the intemperate. Be this as it may, an incalculable injury is thus perpetrated on the unfortunate victims and slaves of a demon propensity, under the abused name of liberty, and a gross injustice done to the sufferers connected with them, and to society at large, whose liberties and privileges ought rather to be protected than thus exposed to infringement and disturbance. When such are the obstacles in obtaining and sufficiently prolonging legal control over the worst class of insane drinkers, how much more difficult it must be to accomplish it, and attempt to effect a cure in those which though comparatively mild, are yet instances of the disease so serious in their effects, that the victims, unrestrained, go on pursuing a ruinous course for time and eternity, and ruinous also as regards others dependent on or connected with them, and subversive of the peace and order of society. Many painful illustrations laying open deep griefs might be given, showing the various ways in which families have been distressed, disgraced, or made destitute by the uncontrolled and uncontrollable course pursued by dipsomaniacs of both sexes. But enough has been said on this point, and I think it will be admitted by all here having experience of such cases that their acts are attributable to a diseased condition of the brain and mind, and not simply to moral depravity, and consequently not to be treated simply by the rebukes or by the discipline of Church Sessions, Presbyteries, or Assemblies. Nothing will do short of such personal control as removes the opportunities to obtain intoxicating liquors; as affords the means, and the time of nourishing and invigorating the body, and of improving the mind—more especially in the exercise of self-respect and self-control, and in leading it into healthier channels of thought and feeling. I will venture to say that had the young minister of Newhills—whose case has been so much before the public of late—been taken charge of by his friends as a dipsomaniac, months even before he was pitched out of his gig and received injuries, which must of course have made his mental condition worse, and more especially if he had been suitably cared for after that accident, he might have been checked in pursuing the mad course of debauchery in which he was hurried along, and instead of being, as he now is, of really, perhaps confirmed, unsound mind, under Dr. Skae's care, he might possibly have had some chance of future usefulness in the Church and in the world. But whether that might have been the result or not, the reasonings of some members of the Aberdeen Presbytery on the whole case show the need of greater public enlightenment on the condition of insane drinkers. It is no doubt praiseworthy for ministers of the gospel unhesitatingly to tear off the cloak designedly thrown over moral responsibility, and give cautious credence to subtle materialistic modes of accounting for the sins of men on the ground of physical and mental conformation; but the views of medical men of experience and respectability ought to be regarded with due respect on matters in which they should be the best judges, when they accord with all that has been written and said of late on the subject of insane drinking. Medical opinion has come boldly and decidedly out of late on this subject, and the public mind—if I may judge from the press—runs more strongly in support of medical views than might probably have been anticipated where there is so much jealousy naturally felt for anything which threatens encroachment on the liberty of the subject. Let us hope that the heavy piece of ordnance recently fired off by our much respected and distinguished medical chief, whose absence we much regret both for the cause of it and the might of his name and character, together with the influence of this meeting, may hasten the humane and beneficial arrangements which are now proposed. Antiquated legal notions and technicalities may somewhat retard the progress of the movement, but I feel confident that the legal mind generally has undergone great change on this subject within the last few years, and from what has been written and stated to myself by men exercising important judicial functions in the country, there appears to be every wish that something should be done in the matter; and I believe that most of the sternness and opposition with which the subject has been met in some other quarters, is not so much owing to the want of enlightened views as to the nature of the drinking insanity, as the necessity imposed on them to administer the law as it at present stands. It seems, therefore, to me most desirable that the law be changed recognising that form of insanity which is produced or manifested by ex-

cessive habits of intemperance, and that with any guarantee for the protection of the sacred rights of British subjects, so that its restraints may not be viewed in the light of punishment and mere personal control, but in the humane spirit of securing for the insane drinker a greater amount of immediate happiness, and the prospect of that arising from ultimate reclamation. There is just one topic which I shall briefly notice before closing, and that is referred to in the last sentence of my resolution. At one time I was of opinion that enactments distinct from any Lunacy Act should be pled for, from the idea that such an arrangement would be more agreeable to the popular feeling of the country; and that refuges and sanatoria specially devoted to the treatment of this class of the insane, distinct from other lunatics, might spring up in various parts of the country. But I see the difficulty of recognising any as insane persons without including them in an Act for the insane; and it may be quite possible to obtain a few separate clauses in a general Act recognising the existence of such institutions, while it makes suitable arrangements for their supervision and regulation. Then, too, by a general Act, ordinary asylums may be more conveniently taken advantage of for the cure of insane drinkers, in those districts of the country where such refuges or sanatoria for the poorer class of patients do not exist, and also that compulsory detention of the dipsomania class among paupers in workhouses may be properly legalised, which is not the case at present. The Lunacy Commissioners, in their last report, have drawn attention to this subject, in reference to those inebriates compulsorily detained in the Edinburgh House of Refuge, and they very properly ask the official supervision of such establishments. This is highly proper, and would rather be an encouragement to them than otherwise. With the arrangements of the inebriate department of the House of Refuge, and the good done by them, and their difficulties for want of legal powers of admission and detention, perhaps our excellent friend, Dr. Fairbairn, will kindly inform us. I am only acquainted with four other institutions in Scotland for the cure of dipsomaniacs, but they are all on a small scale, receiving only a very limited number of boarders, and necessarily, in order to be remunerative, those of the highest class. I believe if law took that cognisance of insane drinkers which we desire by this resolution, establishments solely for their treatment would spring up, suitable for all classes, and be more than self-supporting. The amount of good would be incalculable which these institutions might accomplish, by affording occupation, and amusement, and instruction, and promoting a gradual re-introduction to society, and the discharge of civil privileges. In regard to the private establishments at present existing—two in the Island of Skye, one at St. Catherine's, Lochfine, and one near Clackmannan—I have only had an opportunity of visiting the latter—viz., Mr. Sword's, at Kennetpans, and have found that his establishment accommodates only twelve boarders, but that it is excellently conducted, just on the principle of a well-regulated family. The difficulties acknowledged in the conducting of these private establishments are those which might naturally be expected—viz., no power on the side of relatives or friends to enforce admission, and no power for the superintendents of these institutions to detain the patients sufficiently long to accomplish reclamation. Thus, Mr. Sword, of Kennetpans, informed me that while, during his experience of seven years, some excellent successes had been accomplished, several boarders had left before any real benefit was done, and some he has had to turn away from his want of power to sufficiently control. Some of these boarders, although going into such an establishment voluntarily, under the pressure of friends, did so with the deceitfulness peculiar to their malady, and some became rebels. Nothing but special enactments can meet these evils and difficulties connected with this important subject. I could have wished to have said much more on this subject, but I have already detained you too long, and now sit down, trusting that there will be perfect unanimity in the reception of this resolution.

Dr. W. T. GAIRDNER said he had been asked to second this motion, and in doing so he experienced a difficulty which Dr. Peddie must have felt, and which every medical man must feel, in connexion with the numerous—of the unfortunately too numerous illustrations which arise to his mind in speaking of a subject like this, and to which he was debarred from alluding, because there was no class of cases where the medical vow of secrecy must be more strictly maintained than the class now

under discussion ; and anything like a hint regarding any particular case which might give a key to it was absolutely forbidden. But one could, he thought, speak to the motion upon general principles to some extent, although he thought there was great force in the remark made by Dr. Christison in that admirable lecture upon this subject which had lately been republished, that whatever abstract and theoretical difficulties occurred when they were thinking over the subject in the closet, he never found any person whether belonging to the legal or any other profession, who, when brought face to face with the facts of an individual case, had very much difficulty as to how it should be dealt with—who when he observed the wide-spread disaster which was caused by this particular form of insanity, did not yield up his scruples immediately on being informed in detail of these facts. It is peculiarly a case where the practical resolves the theoretical—where they might muddle their brains with metaphysics and with law, and they found, when they were brought face to face with the palpable and the terrible facts of individual cases, their doubts speedily removed. Trying, then, to deal with the matter on general principles, and to keep in view the reasonable difficulties that might be felt either by lawyers, theologians, moralists, or physicians—because it was the common ground of all the four—he would remark that there were three very obviously different kinds of cases in which intemperance and insanity might be connected with each other. In the first place, the habit of intemperance might be superimposed upon a previously existing insanity. A person notoriously insane might, like any other person, become addicted to drink ; and if he was at large, he might thereby aggravate his insanity to an enormous extent—aggravate, at all events, its serious consequences to an enormous extent. Or, on the other hand, beginning with intemperance and nothing else, this habit might so mix itself up with the mental conditions of the individual—might so encroach upon his powers of self-control—might so eat in upon all that constituted health in his mind and health in his body—that in the end he became a hopelessly paralysed individual—a hopelessly mentally destroyed individual—a hopelessly insane individual. Or, again, there is that class of cases—and that, he believed, was the class which was not only the most common, but that which led to all the difficulties and doubts—there was a class of cases where the two causes of disease were, as it were, inextricably mixed up—where the disease began gradually—the habit of intemperance began gradually, and the insanity upon which it was founded began gradually, and the two acted and re-acted upon each other, producing an exceedingly complex series of effects, to which, when the mind was applied at some distance from the beginning, it was almost impossible to find any clear and unquestionable metaphysical solution. That was, he believed, the class of cases which gave the greatest amount of doubt. There was even at the beginning something wrong—an eccentricity—it might not amount to anything that would constitute a good claim on the part of the individual to be placed in an asylum—it might not amount, *per se*, to a claim either for protection to himself or for protection to others from his dealings. But it was a peculiarity manifested by various circumstances—not only by the desire for drink, but by various other disorders—by various bad habits or eccentricities of conduct—by various things, all of which showed that the controlling power of the will was seriously diminished, and that the intellectual functions were not working clear and smooth either ; and in the midst of this he takes to the habit of drink, which causes such a fatal aggravation of his other symptoms that what was originally a cause of eccentricity degenerates in a short time into clear insanity, which might be manifested in a form approaching to idiocy, or in any of the various forms of mental disorder—sometimes it was hypochondria, sometimes monomania, and sometimes suicidal tendencies. And other forms of vices besides drinking sometimes intermix with cases of mania and monomania, the forms being exceedingly varied, and the sequences of events being exceedingly varied. This class of cases, every one must admit, were exceedingly puzzling if they were to try to demonstrate the metaphysics of the thing—if they were to try to demonstrate the starting point of the malady, or the exact sequence of the phenomena. Now, in all this class of cases there were legal questions involved, and there were also moral and theological questions involved, and the lawyer and the divine each naturally viewed these questions from his own point of view, and both perhaps with a slight tendency to exag-

gerate what was their function in reference to each of them. The lawyer was more apt than another man to view the subject on the side of crime, and the theologian was more apt than another man to view it on the side of sin. He did not mean to say that the divine or the lawyer was wrong in his way of viewing it, or that the medical man was right exclusively in his way of viewing it. But he would say that there was something essentially different in the medical man's point of view from the lawyer's and theologian's; and what he wished to point out was that the medical man's way of viewing it was not inconsistent with the others. It was a parallel decision, but not a decision which precluded others from forming their own decision upon their own grounds. The way in which a medical man viewed this subject when consulted simply as a medical man, apart from his going to a court to give evidence, was simply as a practical question of treatment and cure; he had nothing whatever to do with the metaphysics, or with the law, or with the theology which might be mixed up with the matter. And there was a very great advantage, as it appeared to him, to the public, and to the medical man himself, and to his patient, in his being placed in such a position that he could put all these things off his mind, and simply ask himself, in regard to this particular case, "Here is a great evil to be met—what is to be done in the interest of the patient, and in the interest of society to avert the inevitable impending ruin, destruction, loss of health, loss of character, loss of moral principle, loss of reputation, and the inevitable complication of evils that he sees to be impending if that person is allowed to go at large?" Now, he did think that, without assuming infallibility for the medical profession, they might fairly say that this was a very clear and distinct point of view, that, if they keep to their own point of view—if they did not mix themselves up before they were asked with the points of view of other professions—they might fairly be left, in the interests of the public, to settle their own questions in their own way as much as possible, without being interfered with by the law. Moreover, it might be remarked that the medical man did not wish to prejudice the legal solutions of the case. He declares such a person to be an insensate drinker, or an insane drinker, or anything you like to call it; and when he did so he put the personal liberty of that person under restraint upon that ground. But the medical man did not wish to say that that person, regarding whom he had made such a declaration, and who had been placed under restraint on account of that declaration, was not to a great extent responsible for his own condition. He did not prejudice the solution of any question which might arise if that man came into a court of justice. If, for instance, clergymen had to deal with the case of one of their number who was accused of drunkenness, the medical man did not, by declaring that man insane, or an insensate drinker, wish to prejudice the question of how far the accused party was responsible for the state that he had been brought into. The medical man did not take that into view at all; he simply declared what was the present condition of the person, and what was required upon consideration of that present condition; he did not go into the history of the past; he did not wish to compromise the legal solution of these questions. He (Dr. Gairdner) thought it was important to keep this in view, because it was apt to be misunderstood. It was a very common idea that when medical men committed a man to an asylum they wished to pronounce him absolved from all sorts of moral and legal responsibility. He thought that was a total mistake. A medical man, when he put an insane person into an asylum, did not wish to prejudice his capability of making a will; and still less in the case of an insane drinker, if, when free from drink, he was in other respects capable of executing a will. He placed this question, then, on the basis that the medical man did not go out of his department, for he had a great practical function to perform towards society—he had a great duty to perform to society and to the insensate or insane drinker, and he ought to be as little hampered in the performance of that duty as possible. He had to answer the question, "What is to be done?" He had to answer the question in the interest of the persons concerned, and with a view to the individual case; and the law ought to try as far as possible not to put into his head, or complicate his action with, those metaphysical and legal subtleties which they knew embarrassed all those questions. The only objection he could see to this was the idea that prevailed that medical men would have too much in their power, and that

the liberty of the subject would be compromised. In regard to that objection he would only say this, that there was no reason whatever in this respect for separating the case of the insane drinker from any other form of insanity whatever. Every person who had to deal with insanity would tell them that there were numbers of insane persons going about in society, in regard to whom it was a very delicate and difficult question whether they required confinement or not. That question must in the nature of the case be left to the medical man. It was a question of treatment—there was no other way of solving the question except by leaving it to those who had the charge of the patient. The law accordingly did so. The law placed certain securities against abuse of their functions, and the medical men acted under these securities, and with those responsibilities to the law. And there seemed to be no good reason whatever why, in the cases of insane drunkards, medical men should be placed in any different position. If they acted in *malafide*, or from mere carelessness exceeded their duty in this respect—if they were to go on confining all sorts of persons because they had been overcome with drink probably once or twice, or half-a-dozen of times—if they were to go and convert their power in this respect into an engine of oppression—the securities of the law would at once come to bear upon them in these cases just as in other cases. They would be subject to actions of damages and all sorts of difficulties; the Lunacy Commissioners would come in and liberate the persons whom the medical men had put into an asylum, and the medical men would gain discredit by that. And surely the character of a medical man was a sufficiently sensitive plant to make him not like to come in contact with that sort of difficulty. He maintained that if the interests of the public could be trusted in the hands of the medical profession in any other kind of insanity, there seemed to be no reason why the medical profession could not also be trusted with this class of cases also.

The resolution was agreed to unanimously.

Dr. ANDREW WOOD moved the adoption of the next resolution, which was as follows:—"That it is desirable that the consent of some public functionary be interposed—as is now the practice in Scotland—between the medical certificate and the confinement of the insane person; and that no public functionaries appear to be better suited for this purpose than the Sheriffs of counties and their substitutes." In supporting the resolution, Dr. Andrew Wood said he had, after carefully considering the question, come to the conclusion—and he hoped the meeting would come to the same conclusion—that it was of great importance that the public functionary that was to be interposed—and there must be some public functionary interposed, that was quite evident—between the medical certificate and the confinement of the patient, ought to be those excellent public officers which Scotland enjoyed, while England was so far, debarred from them—he meant the Sheriffs of counties. So far as he had been able to ascertain, the objections which had been brought against the Sheriff's jurisdiction were chiefly these—first, that in consequence of the necessity of obtaining a warrant from the Sheriff before a patient could be confined there was, in the majority of cases, a very considerable loss of time, causing injury to the patient by delaying the treatment necessary in his case, and placing the friends of the patient sometimes in dangerous circumstances in consequence of the symptoms developed in the interval before confinement. Now, no doubt the necessary application for a warrant often caused loss of time and trouble—and he recollected of a case where a patient became ill on a Sunday, and had to be kept by his friends till the following day, to his own great danger as well as to the danger of those around him. He thought, however, that in some degree the evils arising from delay had been removed by the introduction of what was called "certificates of emergency," but which he would rather—as suggested to him by a very experienced person in these matters—call "a professional certificate." And if they succeeded, as proposed in a previous resolution, in inducing the Lord Advocate to put in a clause in his bill extending the period during which a person might be confined on an emergency or provisional certificate from twenty-four hours to three days, the objection he was now considering to the jurisdiction of the Sheriff would be got rid of. Another objection might easily be raised to the present system, and it was this. By the present form of certificates, they were obliged to state the circumstances which they had observed in regard to the patient,

which led them to consider him of unsound mind. These certificates were sent to the Sheriff, who was thus made to sit as judge over the certificates—that was to say, that while the medical man was held responsible for his certificate, the Sheriff really decided the question of unsoundness. So far as he had seen, the present form of certificate was opposed completely, in his opinion, to common sense, and in practice it had been found by medical men to be most irksome, and he might almost say impracticable. But if the improvement in the certificate suggested in the first resolution should be introduced into a bill, and made the law of the land, another objection to the Sheriff's jurisdiction would be removed, as all he would have to do would simply be to satisfy his mind that the requirements of the Act had been carried out, and that the certificate had been signed by men who, being on the medical register, were properly qualified to sign such certificates. The third, and he believed the great objection to the Sheriff's jurisdiction was this, that it was found that patients and their friends had a great objection to having the consignment to a lunatic asylum put on the footing of a warrant to the Sheriff, in a manner somewhat analogous to the consignment of criminals to gaol. It was argued that this feeling was so strong in the minds of many persons connected with insane people, that the admission of patients to asylums was greatly delayed, and in some cases not carried out at all, greatly to the injury of the patients themselves. He had no doubt that this feeling operated to a very considerable extent, but he would ask, "Are there not a very great many other things that operate in deterring people from sending their friends into asylums?" Was it not a very natural thing that people would not like their friends to go into an asylum at all, because that might damage their prospects in life? This feeling of aversion to sending friends into asylums would therefore continue, whether they required to go to a Sheriff or not; and he thought they must not, therefore, view this question in a one-sided manner. He would be extremely glad to adopt anything which would allay the feeling of aversion to sending patients to asylums, and remove the difficulties at present felt in getting patients promptly under treatment in asylums. At the same time, it must be recollected that the subject must be considered from other points of view. What was it that was proposed by those who wished to do away with the Sheriff's jurisdiction in this matter? It was simply this, that in the case of a British subject they were to be entitled to suspend on this particular case the Habeas Corpus Act. Now, he would say that whatever opinion the medical profession might have in regard to the expediency of having facilities for putting lunatics in asylums, they must have regard to the feelings—or, if they would, to the prejudices of the day, and to the genius of the British Constitution—and in whatever they did they must recollect that there was, and must always be, a great jealousy of any individuals in this country not only being deprived of their liberty, but being deprived of their liberty under circumstances which did not come under the cognisance of some authority whose duty it was to see that there were real and true grounds for the confinement, and that it was not made under improper circumstances. Another objection was brought to the Sheriff's warrant, to the effect that, after all, it was of no use. He was inclined to dissent from that view of the question, because it appeared to him that he should not like to sign a certificate which was to consign any person to a lunatic asylum without a perfect consciousness in his own mind that the certificate would not or could not in any way be abused. And therefore he felt that the fact that the certificate must go before the Sheriff, and be passed through his hands, and be countersigned—if he might so say—by his warrant, that gave him a security that that certificate would not be abused for improper purposes. It might be said that the Lunacy Commissioners would afford the required guarantee against abuse. He would be very well content with the Lunacy Commissioners, but they wanted the element of ubiquity. It was impossible that they could be present at the same time in Edinburgh and in Caithness. That was the advantage of the Sheriff's jurisdiction—that in every quarter of the country they had these most admirable officers situated—men accustomed to administer the law, and who had the Lunacy Act before them, and who, knowing the circumstances, were in a position to know whether all the requirements of the Act had been complied with, and whether the individuals who signed the certificates were properly qualified to do so. If they were to have this power granted which was now asked in regard to

insane drinkers, as he trusted they might have—and he felt the importance of the present meeting, if for no other purpose than for the enlightenment of public opinion which the speeches of Dr. Peddie and Dr. Gairdner had given them that day, and he was quite sure that, coming as these speeches did so immediately after those interesting cases which had occurred in their Church Courts, they would do an immense deal to educate public opinion upon a matter which they very little understood at present; but what he wished to say at present was this, that if they were to get this additional power in regard to the confinement of drunkards, he thought the public would look with enormous suspicion upon them if, whilst they were seeking more power in regard to that important class of patients, they might at the same time appear—for it would be no more than appearance—but if they appeared to be getting rid of the guarantee to the public which the superintendence of the Sheriff seemed to give, that that very great power so committed to medical men, and in a certain degree to the friends of the patients, should not be abused. While, therefore, this question of the Sheriff's jurisdiction was an open question, he thought it would be extremely inadvisable—to say the least—to go to the Government or to the Lord Advocate to ask for such a reform—nay, a revolution—in what had so long existed in this country, and to get a change introduced in regard to the doing away with the powers of those Sheriffs whose jurisdiction and administration in this matter seemed to him to be conformable, not only to the liberty of the British constitution, but he would also say conformable to the genius of the people of Scotland.

Dr. JOHN BROWN seconded the motion.

Dr. CHARLES BELL rose and said that, in the absence of Dr. Burt, who had been unexpectedly obliged to leave the meeting, he had been called to move the following amendment to the motion now proposed:—"That it is not desirable that the consent of any public functionary be interposed, as is now the practice in Scotland, and nowhere else required, between the present medical certificate and the confinement of the lunatic; the present system being only derogatory to the profession, being prejudicial to the patient, forming, as has been found, no protection whatever against vexatious prosecutions, and converting that which ought to be a strictly private professional duty into a public judicial act which unavoidably associates it with the idea of criminality. That, as a substitute for the present form of procedure, it should be required that intimation be made without delay to the Commissioners in Lunacy, of the confinement of the lunatic, with copies of the documents on which the removal has proceeded, they being invested with full powers." He (Dr. Bell) thought the amendment he had now read contained sufficient argument in favour of their seeking for the abolition of the sheriff's jurisdiction in the matter altogether. He was not aware of any advantage which had been derived from the sheriff's warrant, and much disadvantage had resulted therefrom, both to the patients, to their friends, and to the medical profession in general. It led to unnecessary delay, and to the undue publication of what should be considered a private matter altogether; while it gave no protection to the medical man against prosecution; and did not add in the slightest degree to the confidence of the relations of patients in sending their friends for proper treatment to an asylum. It had been stated that there had been few prosecutions of medical men in Scotland, and that the small number of such prosecutions was owing to the interposition of the sheriff. He totally disagreed with that statement. The small number of prosecutions in Scotland was, he maintained, to be attributed to the high character of the medical men who had given the certificates, and the upright and honourable conduct of those men who had the charge of lunatic asylums, and not at all to the sheriff's jurisdiction. The necessity for going to the sheriff for a warrant induced people to believe that lunacy was a crime, not a disease. He saw no more reason why they should go to the sheriff for a warrant to send a person to a proper place of protection than there was for their asking authority from the sheriff in prescribing for any serious illness.

Dr. FAIRBAIRN seconded the amendment.

Dr. SANDERSON, Musselburgh, said he could fully corroborate all that had been said as to the trouble caused to medical men with regard to certificates that came before the sheriff, the certificates being in many cases treated in a very capricious manner. Dr. Sanderson proceeded to state that a private lunatic asylum having

been recently given up in his district in consequence of the death of the superintendent, the lunatics, about ten in number, had to be conveyed to other asylums; and he, as medical attendant of the asylum, gave the requisite certificates, some of which were not received by the sheriff because the patients were to be conveyed to another asylum of which he had the charge, and in which he was supposed to have a money interest. He had no money interest in the asylum beyond being medical attendant in the asylum, but the refusal of the certificate was grounded upon the 71st clause of the Act.

Dr. DOUGLAS MACLAGAN said the question raised by Dr. Sanderson was simply this, whether a person who was a medical attendant of any asylum, and who received fees in that capacity, had a pecuniary interest in it, according to the meaning of the Act; and that was precisely a question for a sheriff to determine. Supposing there had been no sheriff, and Dr. Sanderson had put in these patients into that asylum, and they had afterwards come out and raised an action of damages against him, he might perhaps have suffered under that clause. The sheriff had, therefore, not injured Dr. Sanderson, but protected him by his interference. He was not saying that the clause in the Act referred to by Dr. Sanderson was right—it might be absurd and unnecessary—but the question was whether, with such an enactment before them, it was not a better thing for them to have the sheriffs there, and whether there did not occur questions where the interposition of the sheriff was an important thing for them. The fact that there were fewer prosecutions of medical men in Scotland than in England was undoubted; and there were two theories put forward to account for this—the one being the jurisdiction of the sheriffs, and the other the high character of the medical profession. He was not there to say anything to lower the character of the medical profession in Scotland. He thought they were able to stand their own ground in that respect; but he was not so sure that they were entitled to be quite so uplifted upon their own position as thus to cast a comparative slur upon the medical profession in England, and to say that it was because the Scotch doctors are superior men that English doctors were liable to actions of damages, while the medical profession in Scotland got off for their very high character. Then there was another dilemma into which they would be placed by insisting on this theory of the high character of medical men accounting for the small number of prosecutions, and it was this, “Is it the want of high character that has been the cause of the prosecutions in the cases of those medical men in Scotland who have been subjected to prosecutions?” That was a most serious dilemma into which this theory placed them—and if he had been one of those unfortunate individuals against whom accusations had been brought—and he was very nearly one—he should be very sorry if anybody should say of him, “There is one of those unfortunate fellows whose want of high character has subjected them to prosecution.” He was of opinion that it was the jurisdiction of the sheriff, which distinguished them from England, that had been their protection, and he thought it would be a great pity to do away with that. And he attached great importance to the argument of Dr. Andrew Wood that, while they were asking an increase of power, it would be a pity if they should also be asking, at the same time, to do away with the only thing that appeared to be a *habeas corpus* protection to this class of patients. He believed that, by adopting the amendment of Dr. Charles Bell, they should do a great deal of harm to the cause of this most important meeting.

The CHAIRMAN hoped that some member of the committee who differed from the majority who proposed the motion now before the meeting, would state the grounds of their regret that such a motion had been brought forward. He held strong views upon the subject, but perhaps in his position as chairman he had better put the motion without saying anything.

Dr. JOHN GAIRDNER asked if it was necessary that the meeting should affirm either the proposition of the motion, or that of the amendment. Would it not be better for them simply to say that, provided what they had suggested in the former resolutions was adopted as the basis of an amended Act of Parliament, they were perfectly willing to subscribe to any plan which, in the wisdom of the Legislature, might seem calculated to secure against erroneous imprisonment, for that, he believed, was the only reason alleged for the interposition of the sheriff.

Dr. W. T. GAIRDNER said he could not vote personally for either of the two

motions. They appeared to him to be both quite too positive on the one side and on the other, and to take up a position which they had not sufficiently argued or thought about. The matter was so complicated with legal technicalities, that he was not prepared to assert that the Sheriffs were the only proper persons to interfere on the one hand; nor was he prepared to support the amendment. Within the last few days, having in view that there were considerable differences of opinion upon this subject, and being himself uncommitted upon it, he took an opportunity of speaking to two Sheriffs on the subject, and he had these things in his mind when he spoke to them. He thought, "If the Sheriff's warrant is to be of any use as regards the security of the public, it ought to secure persons against the possibility of being confined to an asylum by the certificates of scamps in our profession, and of incompetent persons." He spoke to both these two gentlemen—and both of them were gentlemen who had been considerably criticised in the profession on account of objecting to the terms of the medical certificates, and he said, "Would you consider it part of your duty, if you got a medical certificate signed by two persons, one of whom you privately knew to be a scamp, and the other of whom you knew to be pretty nearly an idiot—would you think it right in these circumstances to ask for more certificates?" They both replied "No." They said, "The law does not ask us to seek more opinions; the law simply asks us to see whether they are qualified men; we have no right to act upon our knowledge of the character of these men." I replied, "Well, I don't see the use of you; you ought to be abolished, and if not, I want you to have better powers for the protection of the public and of the medical profession." He wished the Sheriff's jurisdiction to be either amended or abolished; he thought that at present it was a mere obstruction. The Sheriff interfered at present where he ought not to interfere; he interfered with their grounds of confining men, which was no part of his business; and he did not interfere with what he should interfere with—namely, the question of whether those who signed the certificates were not notoriously incompetent and disabled from doing so. He could not vote either for the motion or the amendment, but he could vote for the following amendment, which he begged to propose:—"That the existing form of the Sheriff's jurisdiction in cases of insanity is objectionable, as tending to delay and obstruction in the admission of cases of urgency into asylums, and also as interfering with the physician's province, which is to judge of the circumstances under which treatment in asylums is required, and that the security of the public requires only that the competency and good faith of the medical men signing the certificate should be placed beyond suspicion. That the Lord Advocate be requested to take these circumstances into his consideration, with a view either to the amendment of the Sheriff's jurisdiction or to its being replaced by some other provision for accomplishing the object in view."

Dr. RITCHIE seconded the amendment of Dr. W. T. Gairdner.

The CHAIRMAN said he would like to state shortly his views before the vote was taken. The feeling which he had upon the subject was just this—in the first place, the certificate or warrant of the Sheriff was either something or it was nothing. He should assume first that it was something. If it was anything at all, it was a judgment upon evidence laid before him whether the medical men were right in the first instance in saying that the person was insane, and in the second instance in saying that the proper treatment for that person was seclusion. Now, he held that that was a purely medical question, only to be decided by a medical man, and that the interference of a Sheriff in this respect was dominating and ruling over the province of a physician, which he had no right to do in that particular case. Well, then, he should assume, in the second place, that the warrant was a farce—which he believed it was in most cases—he should assume that it was a mere form. He would say, then, that all forms without reality were mere shams and mockeries, and in so important a matter ought to be condemned. If it was a sham, what was the use of it? It increased trouble, created delay, and placed an obstacle between the patient and the early treatment of his disease. Then it invested the asylum with additional horror, for it looks on the one side as a place requiring patients to be protected against it, and on the other as a place of confinement to which patients were sent by a warrant, just as they were sent, by another sort of warrant, to the gaol. It was only the other day that a patient said to him, "Doctor, is it possible

that you put me here like a criminal, with a warrant from the Sheriff?" That was a common feeling, and they knew that whilst relations had no objections to the doctors' certificates they continually objected to the Sheriff's warrant, as that gave publicity and a criminal character to the proceedings. In regard to Dr. MacLagan's remarks as to the cause of the smaller proportion of prosecutions in Scotland than in England, he would ask, "Why is it that we have so few prosecutions for malpractice in Scotland? Why do you continually see in England surgeons and accoucheurs being brought up for having treated wrongly fractures and dislocations, and deliveries, while you never hear of such things in Scotland?" When Dr. MacLagan answered that question, then they would probably know that it was not the interposition of the Sheriff that protected the medical profession from these prosecutions in Scotland. He could understand that if the Sheriff sat as a judge in these cases, and if the medical men came before him as witnesses, and if the Sheriff pronounced a judgment, it would be of vast use, for the medical men coming before him as witnesses would be precluded from those unjust prosecutions, just as in civil or criminal cases, when they gave their testimony on oath. But that was not the case; and in the few cases of prosecution that he had been called to see, he believed that the Sheriffs had never been called even to say that they believed the medical men certified what was true. And yet they were told that this was a necessary protection, to see that the forms were observed. If the keepers of asylums, or medical men, did not observe the forms of the Act of Parliament, they acted at their peril, and that was the protection of the patient. As to its being a suspension of the Habeas Corpus Act, why if that was the case, then in England, where no such form as the Sheriff's warrant was required, the Habeas Corpus Act was being violated twenty times every day. The last consideration he would put before the meeting was this, that the great security of the patient, besides the penalties for the violation of forms, was the fact that they were superintended by the Lunacy Commissioners, educated men, and with medical men among them competent to judge of the merits of any case. Although the Lunacy Commissioners were not ubiquitous, as had been said, they went about the country and would very speedily inquire into any case requiring interference; and this ought to be satisfactory to the public. He thought the great danger was in multiplying protections and difficulties instead of giving facilities for the cure of this malady.

Dr. Charles Bell withdrew his amendment in favour of Dr. W. T. Gairdner's, at the suggestion of Dr. DOUGLAS MACLAGAN, who remarked that some, like himself, could vote for Dr. Gairdner's amendment, though they could not vote for that of Dr. Charles Bell.

A vote was then taken by a show of hands, when Dr. W. T. Gairdner's amendment was carried by a large majority.

Dr. SELLAR proposed the adoption of the following motion, remarking that, notwithstanding the little division that had just taken place, they were really unanimous on all the important matters which had been before them:—"That a memorial embodying the opinions of the meeting be presented to the Lord Advocate; that a committee be appointed to prepare this memorial; and that, in the event of his Lordship agreeing to introduce into a Lunacy Amendment Bill provisions in accordance with these general principles, the committee be authorized to confer with his Lordship on the subject."

Dr. HISLOP, East-Linton, seconded the motion, which was agreed to unanimously.

On the motion of Dr. BALFOUR, a committee was appointed to carry out the object of the resolutions.

A vote of thanks was given to the chairman, on the motion of Dr. JOHN GAIRDNER, which terminated the proceedings.

(*Scotsman*, June 17.)

At the late meeting of the medical profession on the Lunacy Act, considerable difference of opinion was displayed as to the object and utility of the order which

the Sheriff grants for the admission of patients into asylums. When a man becomes insane, and it is considered necessary to place him in confinement, or, in modern phraseology, to detain him under care and treatment, a petition must be presented to the Sheriff for his order, by some person whom the Act has omitted to define, authorizing the reception of the patient into an asylum. This petition must be accompanied by certificates from two medical men that the patient is of unsound mind, and "a proper person to be detained under care and treatment;" and the facts on which this opinion is founded are required to be stated. There are thus three parties implicated in placing a patient in an asylum—the petitioner, the Sheriff, and the medical men. Now, with which of these three lies the onus of the act? With the petitioner? Morally, perhaps, but we should think not legally; for, without the certificates of the medical men that the patient is a proper person to be placed in an asylum, no steps could be taken in the matter; and with such certificates it would be culpable to refrain from doing what the medical advisers recommended for the benefit of their patient. The responsibility must, therefore, lie between the Sheriff and the medical men. The latter, however, are constituted by the Act the only judges of the patient's insanity. They alone are called on to see and examine him, and the duty of the Sheriff appears restricted to seeing that their certificates are framed according to the statutory forms. For aught that the Act says to the contrary, the petitioner may never have seen the patient, and may be resident in a distant part of the country, or even out of Scotland; and the Sheriff, on his part, may be ignorant, not only of the county of the patient's usual residence, but even whether he have a domicile in Scotland. Everything consequently hinges on the medical certificates, and the question accordingly is, whether any check should be exercised over medical men to prevent them granting certificates of insanity without due consideration, and whether, in this event, the Sheriff's order constitutes such a check.

It is a popular belief that the Sheriff's jurisdiction embraces merely his own county. Under the Lunacy Act, however, he is authorized to grant his order for detaining patients in the asylums of *adjoining* counties, and this permission has been used with such latitude that they are sent to asylums in whatever part of Scotland these may be. Accordingly, patients from almost every county will be found in the asylums of Mid-Lothian, admitted on the orders of the Sheriffs of their respective counties. With the existing deficiency of asylum accommodation, it would be difficult for the Sheriffs of many counties to refuse their orders for the transmission of patients to distant asylums; but whether the granting of them is in accordance with the provisions of the statute, is another question, and one which is open to much doubt. But perhaps of even more doubtful legality would be the procedure which the refusal of orders under such circumstances would entail. In this case it would follow that the patients would be removed from their own counties, and carried across various others, to be placed in the asylum of a distant county by the order of a Sheriff, who necessarily would have no knowledge of the patients, and very little, if any, of the medical men granting the certificates. There are in the asylums of Dumfries, Glasgow, and Edinburgh many patients who have been brought not only from distant parts of Scotland, but even from England and Ireland, and who are detained under the orders of the local Sheriffs, granted sometimes on the certificates of practitioners resident within their own jurisdiction, but more frequently perhaps on those of medical men belonging to the places from which the patients were brought. It thus appears that the order of the Sheriff merely guarantees the fact that the statutory forms have been complied with. He knows nothing and inquires nothing about the patient. At one time he sends him a hundred miles or more

from home, far beyond his own supervision ; and at another he authorizes his detention in an asylum within his own county without troubling himself to inquire whether, if a stranger, he were legally brought within his jurisdiction.

Does the Sheriff's order, then, serve as a protection to the subject ? We do not see how it can be regarded in this light. If a patient is brought to Glasgow on the certificates of two doctors of Tipperary, or to Edinburgh on those of two practitioners of Manchester, the Sheriff grants his order without stopping to inquire the character of the men whose names are appended. We do not suppose he even turns up the Medical Register to ascertain whether they are qualified practitioners. He lets those who gave their signatures take the responsibility of the act. In this course we apprehend he is legally right ; but then, we would ask, wherein lies the virtue or utility of his order ? Dr. Christison regards it as a buffer to protect the medical man from actions of damages on the part of the patient. But even in this respect it is but a sham, a delusion, and a snare, and fails in its purpose. It is possible that the knowledge that their certificates must be submitted to the Sheriff, operates, with some medical men, in rendering them more cautious than they would otherwise be in certifying insanity, and herein, we believe, lies the chief use of the Sheriff's order, and the only valid reason for retaining it. It is to the operation of this cause that we would in some degree ascribe the fact, if fact it be, that the number of actions of damages brought by patients against medical men is less in Scotland than in England. We are, however, by no means sure that, taking into consideration the greater population of England, any such difference really exists. At any rate, we should be glad to see the statistics on which this opinion is founded. And it must also be remembered that in England the number of private asylums is comparatively much greater than in Scotland ; and that in the former country private patients are generally placed in these establishments, whereas in Scotland public asylums have the preference. The risk of collusion for the detention of patients may accordingly be supposed to be greater in England than in Scotland, inasmuch as private interests come there more into play, and the fear of having been the victim of such collusion may in a certain degree influence the number of prosecutions. But it has further to be considered that the status of legal practitioners in the two countries may affect the result. It may possibly be more easy to find a pettifogging lawyer in England than in Scotland—that is, one who will undertake the patient's case on grounds evidently frivolous and vexatious. There are, therefore, various grounds for doubting whether Dr. Christison's views may not have been too hastily adopted.

Since the passing of the Lunacy Act the position of the Sheriff in regard to lunatics has been greatly modified. Formerly, he was authorized not only to grant his warrant for the admission of patients into asylums, but he was constituted the statutory visitor of these establishments. Under the new *régime*, the duties of visitation are performed by the Commissioners in Lunacy, and for this reason, among others, we are inclined to think that the authority for the admission of patients, also, should now emanate from them. It is frequently said that, in England, no authority equivalent to the Sheriff's order is necessary for the admission of a patient. In one sense this is true. A private patient is admitted on the order of a relative and two medical certificates ; and a pauper on the order of a justice, or that of a clergyman and the relieving officer of the union, and one medical certificate. But in England the order is not a warrant for detention in the meaning attached to the term in Scotland, but rather a permission to extend to the patient the benefits of the institution, and is, in fact, analogous to the order granted by a manager or subscriber for admission into the wards of the Royal

Infirmary. Hence, the order only of a justice of the county in which the asylum is situated, or that of the overseer of a parish within the county, or having otherwise a claim to the admission of its pauper lunatics, would be accepted. The asylum is thus regarded as a benevolent institution, and not as a prison to which patients are committed under a legal warrant. The check against abuse, and one which, we believe, is in reality more efficacious than the Sheriff's order is with us, lies in the transmission of copies of the documents on which admission takes place to the Commissioners in Lunacy. It is their duty to examine these documents, and to judge whether the medical certificates are filled up in accordance with the statute, to call for their amendment when imperfect, and to require the discharge of the patient when the evidence of insanity is unsatisfactory. Under this procedure there occurs no delay in placing the patients under treatment. Accordingly, there is no necessity for certificates of emergency, and the great grievance complained of by medical men in Scotland, of botheration and annoyance from crotchety Sheriffs, is never heard of. It is true that similar documents are transmitted to the Scotch Board of Lunacy, but the Scotch statute does not empower the Commissioners to act on them. The old Scotch and the modern English procedure are both partially introduced into the new Lunacy Act, and, from their incompatibility, are constantly jostling each other. The question, therefore, to be decided is, which should have the preference. We incline to the belief that the English procedure is most in accordance with modern views as to the nature of insanity and the treatment of the insane, and that it is likewise best calculated to prevent improper detention in asylums. At all events, it is clear that some change is urgently called for in a system which allows the patients to fall between two stools, and gives satisfaction neither to the medical profession nor the public.

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ART. I.—THE STUDY OF MEDICINE.

“WHEN,” says Archbishop Whately, “complaints are made—often not altogether without reason—of the prevailing ignorance of facts on such and such subjects, it will often be found that the parties censured, though possessing less knowledge than is desirable, yet possess more than they know what to do with. Their deficiency in arranging and applying their knowledge, in combining facts, and correctly deducing, and rightly employing general principles, will be perhaps greater than their ignorance of facts. Now, to attempt remedying this defect by imparting to them additional knowledge,—to confer the advantage of wider experience on those who have not skill in profiting by experience,—is to attempt enlarging the prospect of a short-sighted man by bringing him to the top of a hill. Since he could not, on the plain, see distinctly the objects before him, the wider horizon from the hill-top is utterly lost on him.”

It would seem, indeed, as if everything had changed since the days of Bacon. Up to that time the prevailing fault among philosophers was hasty, careless, and scanty observation, and the want of copious and patient experiment. On supposed facts, not carefully ascertained, and often on mere baseless conjecture, men proceeded to reason, often very closely and ingeniously, forgetting that no architectural skill in a superstructure could give it greater firmness than the foundation on which it rests. In other words, they reasoned upon fancies instead of facts. Since the days of Bacon, there has been an ever-increasing tendency—

never greater than at the present day—to disparage the reasoning process, and to substitute in the place of this process “the mere accumulated knowledge of a multitude of facts,” and to trust to what is often called *experience*, meaning by that an extensive, but crude and undigested, observation.

Now, we do not wish to be misunderstood in applying these general remarks to the present state of the medical sciences, for no one can be prouder of the triumphs of medicine, or less inclined to speak disparagingly of a profession which is only second to one in honour; but we would ask whether the difficulties which now beset the student are not rather in arranging and applying his knowledge, in combining facts, and correctly deducing and rightly employing general principles, than in any ignorance of facts? We would ask whether the multitude of facts which are now crowded into the different subjects with which the student of medicine has specially to do—anatomy, human and comparative, physiology, zoology, botany, chemistry, *materia-medica*, surgery, medicine, &c.—is not more than he knows what to do with, and whether in mastering these facts (if any one may hope to master them), there is not much danger of being bewildered, or, at best, of leaving little or no time for the deduction and right employment of general principles? That it is so, we, for our part, have no manner of doubt; and we are equally confident that this conviction is in no sense peculiar to us.

Sir William Hamilton has very happily shown that knowledge and intellectual cultivation are not identical—understanding by knowledge the mere possession of truths; by intellectual cultivation or development, “the power, acquired through exercise by the higher faculties, of a more varied, vigorous, and protracted activity.”

“Knowledge and intellectual cultivation,” he writes, “are not only not the same, but stand in no necessary proportion to each other. This is manifest if we consider the very different conditions under which these two qualities are acquired. The one condition under which all powers, and consequently the intellectual faculties, are developed, is exercise. The more intense and continuous the exercise, the more vigorously developed will be the power.

“But a certain quantity of knowledge—in other words, a certain amount of possessed truths—does not suppose, as its condition, a corresponding sum of intellectual exercise. One truth requires much, another truth requires little, effort in acquisition; and while the original discovery of a truth evolves, perhaps, a maximum of the highest quality of energy, the subsequent learning of that truth elicits, probably, but a minimum of the very lowest.”

The neglect of this important distinction underlies and vitiates

to no small extent the system of tuition pursued in our schools of medicine, and is the chief source of those evils to which we have referred. What, then, is to be done? Can any course be suggested which, while tending immediately to lessen these evils, would at the same time conduce to the better and fuller exercise of the higher faculties of the mind? We propose to indicate briefly one method, at least, in which we conceive it possible that these desirable ends may be obtained.

Enough has been already done to enable us to see that there is some fundamental principle at work in nature, and that the different phenomena of nature—those that are evidently normal as well as those that are apparently abnormal—will require to be interpreted by this principle before they can be fully understood. We do not say that this fundamental principle has yet been realized. We only say that enough has been done, not only to reveal the existence of such a principle, but to tell us *where* we may expect to find it. Now we would point out in what manner the search after this principle might aid the student in acquiring, eventually, something like fixed scientific principles. We remember well the difficulties of our own student days;—we remember the painful sense of bewilderment arising on all hands when beginning to collect our thoughts amidst the distracting whirl of phenomena, presented to our notice by lecture after lecture and sight after sight; we remember, also, with much thankfulness the instructions by which, after great turmoil and doubt, our mind was enabled to settle down towards something like settled scientific principles; and we venture to think that we shall not altogether err in seeking to direct attention to this subject.

In endeavouring to carry out our object it will be convenient to begin by asking a few questions concerning certain physical agencies which are of continually growing importance in medical studies. And first, of electricity. What is electricity? It is no single agent: it is a name for many agents in one—heat, light, magnetism, and others. What is magnetism? Nothing apart from electricity. What is artificial light? Like natural light, it goes hand in hand with heat, and it has the same power of working chemical wonders upon the magic screen of the photographic camera. What is heat? It is one of the signs of luminous and electrical and chemical action. What is chemical power? A power which bursts into light and heat in flame, and which changes into electricity and magnetism in the galvanic trough. What are the attractive forces which are associated with electricity and magnetism, and which play so important a part in chemical changes? Nothing is known about them, and, after all, they may prove to be only varying aspects of

that force of attraction which is supposed to be neither electrical, nor magnetical, nor chemical—even the force of gravity. Indeed, so intimate and inseparable is the connexion between these agents, that it is more easy to look upon them as *signs of action* than as *agents*. It is impossible, indeed, to thoroughly investigate any one of these subjects without investigating all; and now, thanks to the labours of such men as Davy and Faraday and Grove, it is not difficult to see that there is here some general principle or law of which light, heat, electricity, magnetism, chemical power, and some kinds of motion, are only so many effects. It is not difficult to see that there is here some common principle among a multitude of facts.

But this is not all. It is not easy to draw a distinct line of demarcation between artificial light and natural light; and it is equally difficult to separate the phenomena which are correlative of artificial light from the phenomena which are correlative of natural light. Light, heat, and chemical power attend upon the force of gravity in the solar ray, and render it difficult to regard this force of gravity as an isolated and independent agent; and it is not easy to suppose that magnetism and electricity do not form part of the principle by which the earth and heavenly bodies are ruled. In other words, the province of astronomy becomes trenched upon, and the question arises whether the light and heat and *motion* even of the heavenly bodies are not to be regarded as mere signs of the working of one principle, and that principle the same as that which stands revealed to the eye of the experimental philosopher.

Certainly, it is more easy to believe in this unity of principle than to disbelieve in it—for the harmonious workings of nature appear to demand some harmonizing common principle—but it is much more easy to conceive the idea than to realize the grounds of such belief. At the same time, the attempt was made, not long ago, by an anonymous author in a book called "*Nomos, or an attempt to demonstrate a Central Physical Law in Nature,*"* and this attempt is well worthy of serious consideration. It is worthy of serious consideration, not only as pointing out with great clearness the common law which binds together electricity and light, and heat and the rest, but as reducing to one kind of motion the several kinds of movement which are the subject of ordinary experimental inquiry. In this work the author affords a physical explanation of those difficult motions which belong to electricity and magnetism, and not only so, but he attempts to show, that upon the same principle, the heavenly bodies will begin as well as continue to move, not only in their appointed orbits, but also

* Post 8vo. Longman. 1857.

around their axes. In a word, he attempts to show that the inorganic world is ruled by one single principle, of whose operation the phenomena of electricity, magnetism, light, heat, chemical action, and physical motion in every form, are only so many signs of action, and that no secret in the world of inorganic nature can be fully understood except upon this assumption of unity of principle or agent. Now such an attempt as this may be premature, and many of the conclusions may be incorrect, as in all probability they are, but the attempt, however imperfectly carried out, is one which claims the sympathy of every philosophical inquirer as a step made in the right direction.

There is, moreover, a certain connexion between vital and physical phenomena which would seem to show that all these phenomena may spring from a common cause, as indeed Mr. Grove has hinted at in his *Correlation of the Physical Forces*. The exercise of every function is attended with the generation of heat. The formation of carbonic acid and water in the act of respiration gives out latent caloric. The bodily temperature rises during inflammatory action and sinks during a period of fasting, and this without any corresponding variation in activity of the respiratory function. The bodily temperature rises equally during mental and nervous excitement, and sinks as constantly during the opposite periods of exhaustion and depression. *Chemical affinities* are called into play in respiration, and they are continually being detected in processes which were once thought to be exclusively vital in their character. *Electricity* is developed during the germination of seeds, as was first shown by Pouillet, and in the *Gymnotus* this development is so considerable that the creature may be said to be armed with mimic thunderbolts. *Light* is emitted by many fungi in certain states of the atmosphere, and by the hosts of marine animals which are seen to blaze in the eddy of a vessel. Nor is it different with the *motion* which is manifested in plants and animals, for there is reason to believe,* not only that vital and physical motion are connected, but that they are obedient to the same law. But it is in the periodical changes in the vital manifestations of plants and animals, and in the obvious dependence of these changes upon certain physical causes, that the intimate connexion between vital and physical phenomena is most clearly revealed; and it may be well, therefore, to dwell upon these facts for a moment.

The periodical changes in the life of the sensitive plant are both plain and simple. In spring the seedling emerges from the

* See, in reference to this question, Physiological Introduction to Dr. Radcliffe's work on *Epileptic and other Convulsive Affections of the Nervous System*. Post 8vo. Churchill. 3rd edition. 1861.

cradle in which it had slept during the winter; in summer it puts forth its foliage; in autumn it droops; in winter it dies. In spring it gives new signs of life; in summer it regains its verdure; in autumn it fades; and in winter it again becomes a bare and lifeless twig. Year by year these phenomena succeed each other with unfailing regularity, and the vitality ebbs and flows in direct relation to the ebbing and flowing intensity of the sunbeams. At daybreak, also, the leaves recover from the closed and pendant condition in which they had been all night, and if not disturbed in any way, they remain unfolded till evening, when they again close and droop; and these changes alternate with perfect regularity so long as the leaves retain their characteristic irritability. In a word, these vital movements of the plant correspond to certain changes in the relative position of the earth and sun, the one referring to the annual, the other to the diurnal revolution.

And so also with the periodical changes which are exhibited in the life of the common newt. Like the seed of the plant, the egg exhibits no sign of development unless it be quickened by the sunbeams; and like the plant, also, the liberated animal is throughout its life dependent upon the same fostering help. As spring advances it grows day by day into a more active and sentient being; as autumn wanes it droops by degrees until at last all its faculties are locked up in unbroken sleep. This winter-slumber passes off at the return of spring, and the creature lives again until the end of autumn; and these changes are repeated through succeeding springs and autumns with as much regularity as the corresponding changes in the life of the sensitive plant. In summer, also, the newt wakes in the daytime, and sleeps at night. In a word, the life of this creature appears to be as closely wedded to the sun as is the life of the sensitive plant; and yet this life embraces a sentient principle which is endowed with memory and other mysterious gifts.

These changes are also reflected in other plants and animals.

The woods and fields of this country are bare and desolate in winter, and the few trees and plants which retain their verdure are half dead, because the sun has withdrawn his warmer rays. The shores of Lapland present only scanty patches of moss, and the banks of the Amazon are hidden under an impenetrable and unbroken tangle of forest trees, because the arctic regions do not share in the perennial summer of the tropics. A brief winter may even be said to reign during the night, for on passing within the polar regions the seasons of winter and night are found to become confounded and identical.

The animal world exhibits the same obedience to the seasons. The herring which had been born in the northern seas during the summer forsakes its birthplace before the winter, and follows its

parent luminary towards the south. The frog sleeps soundly under the waters of the frozen pond. The swallow shuns the winter, or if she remain, she forgets her solitude and sleeps until the chirp of her old companions is borne upon the warm gales of returning spring. The bat has lost its birdlike energy and it sleeps while the swallow is away. The marmot is only nimble during the summer, and at other times it must sleep or follow the day in its southward course. The animals, also, which live in the winter are still the subjects of the same law, for though they are clothed in warmer vestments, they have lost that vital heat, the overflowing of which provides for the renewal of their own life in that of their offspring.

The diurnal changes in the life of the newt are also reflected by diurnal changes in the life of other animals, and, as a rule, sleep attends upon the night and wakefulness upon the day. And that sleep is caused by the night and wakefulness by the day, may be argued from the changes by which the periods of sleep and wakefulness are made to correspond at all seasons to the continually changing periods of day and night. The sheep, for example, sleeps from sunset to sunrise, and wakes from sunrise to sunset, and this it does throughout the year. It cannot sleep, therefore, because it is *exhausted* from having been awake, for the slumber is briefest and lightest after the accumulated fatigue of a midsummer day, and longest and heaviest when winter has most abridged the period of daily exertion. The times of renewal and waste are, indeed, inversely related to each other. But the slumbers may be expected to observe the law which governs them, and be brief and light in summer and long and profound in winter, if the energy of waking life be derived from the sun, for then the animal *must* wake in the daytime and sleep at night, and the periods of wakefulness and sleep *must* bear an exact correspondence to the changing periods of day and night. The fact, therefore, that there are these changes and correspondences, and that sleep cannot well be accounted for as a consequence of the exhaustion of wakefulness, or wakefulness as a mere consequence of the refreshment connected with sleep, is a powerful argument that the sheep, and with it the great multitude of living creatures, wake and sleep in implicit obedience to the rising and setting sun.

Arguing from a fact connected with the "nocturnal life of animals in primeval forests," which forms a brilliant passage in the "Aspects of Nature," it would even seem that the moon has some share in the sleep-dispelling power which belongs to the sun. Humboldt writes:—"Soon after eleven o'clock such a disturbance began to be heard in the adjoining forest, that for the remainder of the night all sleep was impossible. The wild cries of animals raged through the forest; and among the many

voices which resounded together, the Indians could only recognise those which, after short pauses in the general uproar, were first heard singly. There was the monotonous howl of the howling monkeys, the plaintive, soft, and almost flute-like tones of the small sapajous, the snorting grumbles of the striped nocturnal monkeys, the interrupted cries of the great tiger, the cuguar or maneless American lion, the peccary, the sloth, and a host of parrots or parraguas, and other pheasant-like birds. When the tigers came near the edge of the forest, our dog, which had before barked incessantly, came howling to seek refuge under our hammocks. Sometimes the cry of a tiger was heard to proceed from amidst the high branches of a tree, and was in such case always accompanied by the plaintive piping of the monkeys, who were seeking to escape from the unwonted pursuit." This extraordinary turmoil, it must be observed, occurred when "the night was humid, mild, and *moonlit*;" and the Indians accompanying Humboldt accounted for it as a consequence of the moonlight, saying that "the animals were rejoicing in the bright moonlight, and keeping the feast of the full moon." Humboldt himself attempts to account for it by ascribing it to some accidental combat—"the jaguar pursues the peccaries and tapirs, and these, pressing against each other in their flight, break through the interwoven tree-like shrubs which impede their escape; the apes on the tops of the trees, being frightened by the crash, join their cries to those of the larger animals; this arouses the tribes of birds which build their nests in communities, and thus the whole animal world becomes in a state of commotion;" and this may be the explanation occasionally. But the frequent connexion of the turmoil with full-moon light is curious; and this is the question of interest here. Is it that the nocturnal riot on the banks of the Cassiquiare, so vividly described, when the wild animals are "keeping the feast of the full moon," and the baying of the mastiff in the English homestead on the same occasion are parallel phenomena? for if they are, then the two facts afford a double reason for supposing that the moon is endowed with some degree of the vivifying power which belongs to the sun.

There are, also, certain familiar facts which serve to show that artificial light and heat have a sun-like influence upon plant and animal. The convolvulus awakes throughout the night in a well-lit room; the sensitive plant lives during the winter under the fostering shelter of the hot-house; the imprisoned squirrel does not hybernate in the warm kitchen; and the snail sleeps soundly through the summer in an ice house. These facts are of great interest in themselves, but they are of greater interest as confirming the conclusions which have been arrived at respecting the

vivifying power of the sun, and as rendering it more than probable that the moon has some share of a similar energy; for if this vivifying power belongs to artificial light and heat, it is impossible to conceive that it does not belong to natural light and heat.

It is clear, however, that the sun and moon are not to be regarded as the sole spring of life, for there are animals which sleep in the daytime and wake at night, and there is man himself, who sleeps and wakes with little apparent regularity. And so it should be.

In the case of man, the periods of sleep and wakefulness must occur at irregular intervals, because there is no regularity in the times of meals, or in the various moods of pain and pleasure. Food supplies fuel, by the burning of which the Laplander is able to keep himself warm throughout his sunless winter. It feeds a fire within which does the office of the sun, so far as he is concerned; and what it does for him it does for all. If, therefore, the food be taken irregularly, the warming and vivifying effects resulting from that food must occur irregularly. Again, pain depresses and pleasure excites; and as pain and pleasure are events which occur without any definite order, there can be no definite order in the states of depression or excitement resulting from them. And certainly the pain of hunger is for a while sufficient to drive away sleep. In man, therefore, the mere irregularity which there is in the times of meals, and in the moods of pain and pleasure, is sufficient to account for the want of absolutely fixed periods of sleep and wakefulness.

On the same principles, it is easy to understand how some animals should wake when others are asleep. The animals which thus wake are supplied with richer food, and gifted with acuter feelings, than diurnal animals; and these facts may have a direct bearing upon the difference in their habits. If food exerts so decided an influence upon man, it may be expected to affect them similarly. If hunger wakes him, it may be expected to wake them. If, then, first of all, it be supposed that these animals were set to discharge their appointed duty at night, and that they were provided with appetites to devour a quantity of food sufficient for the wants of twenty-four hours, their hunger would wake them regularly at night, just as it wakes the man who has gone dinnerless or supperless to bed; and as they are devoid of any spontaneous power by which they could alter their relations to that law of which they are the subjects, they would continue to eat and wake and sleep in the same order. And that this is at least a part of the true explanation may be argued from the fact that there is a complete revolution in the habits of lions, and other nocturnal animals, by which they are made to wake in the day

and sleep at night, when they are confined in menageries and fed in the daytime.

In spite of every cause of perturbation, there is a strong bond of connexion between sleep and darkness, even in man. It is something more than accident which so often causes the shepherd boy to sleep and wake with his flock. It is something more than accident which causes man to be stunted, stolid, and passionless in countries where the sun never rises for months together.

It is no part of our intention to pursue any speculations of this kind into particulars; but if it were otherwise, we should wish to remove all objections, and show that it is not possible to explain the periodicity of vital phenomena unless upon the supposition that the law which regulates these phenomena is one and the same with that law which rules, not the earth only, but the universe. Nay, we would wish to show that the *bodies* even, in which vital and physical phenomena are manifested, are connected in a way which cannot be understood, except upon the theory of some common archetype—an archetype which embodies every diversity of form, and connects not only the different parts of plants and animals with each other, but which connects plants and animals, and links the lower forms of organic life, and, through them, the higher, with inorganic bodies—with bodies which, in one sense, may be said to hold the relation of skeleton to the skeleton of plants and animals. These topics are indeed tempting, and we would fain dilate upon them, but we must be content with asserting that there need be no doubt upon the mind of any one who will yield himself to the patient investigation of nature, with such light as is already at his disposal, as to the actual existence of some grand, some fundamental principle in all phenomena, vital and physical, terrestrial and cosmical.

Now if there be such a principle as this, it is evident that all natural phenomena must be viewed in relation to it, and that no proper interpretation of any phenomenon can be hoped for in any other way. As well might we attempt to understand the falling of a stone towards the earth, or of the earth towards the sun apart from the law of gravitation. If there be such a principle it is no question of theory: it is one of practice—of every-day practice, and this will become apparent just in proportion to the degree in which medicine shall become raised to the rank of an exact science.

For what is disease? Is it something *unnatural*, or is it a *natural* consequence of the violation of some law or principle—of some altered relations of things in themselves natural and fixed? Do not the history of medicine and the spirit of philosophy alike require us to believe that it is something *natural*

and not something *unnatural*, and that disease has to be cured by removing the patient out of that state or position in which the disease is *natural*? Are not ague and remittent fever and dysentery, are not fevers and plague the *natural* consequences of the localities in which they arise, and may not these diseases be expected to disappear when these localities are changed? Of this there can be no doubt. And is it not so with cholera? Look at India, and it will be seen that ague, and remittent fever, and dysentery and *cholera* all originate in very similar localities, and under very similar circumstances, appearing as the water dries up from the swampy grounds and disappearing as the rains return. There is evidently the same cause at work, for not only does cholera show its connexion with what is called *miasm*, by appearing and disappearing with diseases which are so certainly connected with *miasm* as ague, remittent fever, and dysentery, but it bears witness to the same fact by interblending in many different ways with these very affections. This is no new opinion. On the contrary, the intimate connexion in nature and cause between cholera and ague, and between cholera and tropical fevers and dysenteries, is now very generally recognised by the persons best acquainted with tropical diseases. And certainly there is some reason to believe that the history of cholera in India is the history of cholera elsewhere, where that history is fully understood. At any rate, it is only by this history in India, as it seems to us, that the history of cholera in the metropolis in the last epidemic is to be understood. Did not the unusual prevalence of ague (a well-observed fact) before the outbreak of cholera bear testimony to the presence of some *miasm*, and did not the unusual dryness of the weather before and during the epidemic predispose to the generation of this *miasm* by allowing the mud in the drains and on the surface to pass into a state of perilous dryness? Interpreted by the history of India it was no anomaly that a pestilence so dire should stalk abroad under skies of such unusual brightness and serenity. No doubt, much has to be learned as to the particular nature of cholera, and as to the grounds upon which this affection differs from and agrees with ague and remittent fever and dysentery, but in the meantime something is learned which is not learned on the table of the dead-house, or in the field of the microscope, or by random trials of various remedies. Thus, if unusual dryness of the season (*i.e.* a tendency to tropical drought) be a cause, it is obvious that we should endeavour to reproduce as far as possible the state of things which obtains in rainy weather; and in low districts like Westminster, for example, where the water-supply is scanty at best, and altogether wanting in some parts, it becomes a question whether the tide ought to be altogether excluded from the drains

in seasons of drought, and whether the best means of preventing or suspending a visitation of cholera would not be to open, occasionally and partially, the *pen-stocks* and *tide-flaps* at the mouths of the great drains. A plan of this kind was adopted, if we remember rightly, some years ago, after cholera had broken out in a town near the Ouse, in the East Riding of Yorkshire, and with immediate and permanent benefit. Or the requisite supply of water might be obtained from other sources. In any case, the object must be to take care that as much water enters the drains, or lodges upon the surface, as enters or lodges in comparatively wet weather. Again, if cholera be akin to ague and remittent fever and dysentery in its causes, it is obvious that quinine will be an all-important remedy, and especially as a prophylactic—an inference which is now being rapidly confirmed by experience; or at any rate, that light as to the treatment of cholera will be reflected from what is known—and not a little is now known—of the treatment of the affections akin to cholera.

Again, is there not reason to believe that consumption is something *natural*, and not something *unnatural*, and that this disease has to be cured by removing the patient out of that state or position in which it is *natural*? Look at the history of consumption in Scotland and Holland, as related by Dr. Beddoes. While the Scotch dressed in homespun linsey-woolsey and were warmly clad, and while the Dutch wrapped themselves until they made themselves more like bobbins than anything else, coughs were rarely heard in the churches of Scotland and Holland, and consumption was a rare disease; but when the Scotch adopted the thin cold cottons of Glasgow, and the Dutch donned the light French style of dress which is now the *mode*, their coughs began to disturb divine worship as much as they do now, and consumption became a common disease. Look again at butchers, who, as their ruddy appearance testifies, eat large quantities of animal food, and are, as a body, free from consumption; and remember the other day that some curious evidence was adduced to show that consumptive persons, as a rule, are in the habit of abstaining from fat. Remember, too, that a fluid fat—cod liver oil—has been found to be the most effectual remedy in the treatment of consumption. In other words, there is some reason to believe, that consumption may be the natural consequence of the surface being imperfectly protected in cold weather, so that, in common language, the blood has been driven to the lungs, and of certain errors of diet, by which too little animal food and too little fatty matters have been supplied habitually. These reasons, of course, among others, and many others. And certainly there is nothing in the diseased product called tubercle which need be any objection to this view, for this product is nothing more than certain natural

products which have stopped short at a period of development, more or less rudimentary.

These are of course only hints, and very imperfect hints, of the way in which it may be expected that certain diseases will be shown to be something *in order*, and not something *out of order*. Demonstration is a different matter, and, perhaps, the time has not yet arrived in which demonstration may be hoped for; but we see enough already to be convinced that the time will come when every disease, acute and chronic, will be shown to be something as perfectly *in order*—something as perfectly *natural*—something as perfectly physiological—as health itself.

But once more to leave special speculations and return to the course which must be pursued in the search after principle or law, for we are yet far from the grandest generalization of all.

Now there is much that may be interpreted by an appeal to nature, and that will be interpreted just in proportion to the degree in which the person appealing is convinced of that unity of law to which we have been directing attention; but there is also much which cannot be interpreted by this means alone.

If we appeal to nature and ask what is life, and conscience, and will, and intelligence, with its wondrous power of memory and anticipation, what is the answer? The oracle is as dumb as that of ancient Delphi, for it boots nothing to be told to ransack the convolutions of the brain, and it avails as little to pore over the pages of the metaphysician. And yet the physician must set himself to learn all he can respecting these faculties, or he will not have much chance of relieving the most important maladies of which the human frame is subject.

But these faculties are not altogether unintelligible. They are unintelligible if information respecting them be sought solely in the oracle of nature; but they are not unintelligible if information be sought first at an oracle which is higher than that of nature. The former oracle is dumb: the latter answers simply and unequivocally that man was created in the image of Him who is revealed to us as eternal, infinitely holy, all-powerful, all-wise—even God himself. And if this, then, be the fact, is there any wonder that man, whose nature is thus Godlike, should be endowed with life and conscience, and will and intelligence? Assuredly not. The wonder is, not that man should *live*, but that he should be so shorn of the life of Him who is from everlasting to everlasting. The wonder is, not that man should be endowed with *conscience*, but that that beam which tells of the holiness of man's august original, should be so dimmed with evil. The wonder is, not that man should have a *will*, but that the image of the omnipotent God should be so uncertain and helpless. The wonder is, not that man should know a little, and remember a little, and

anticipate a little, but that he should retain so little of the intelligence of Him to whom past and present and future are at once open. The wonder is, that man should be so "lapsed in time and passion"—but why talk of wonder, for if we listen to the same oracle which tells us that man was created in the image of God, we shall soon learn that man has forfeited his high birth-right.

Now we believe, and we believe unhesitatingly, that it is only by accepting this key that we can hope to comprehend the higher mysteries of the life of man ; and we believe, moreover, that without this key it will be impossible to comprehend any vital phenomena whatever. Man is not altogether severed from the lower forms of life. On the contrary, there is a common type, a common law which binds him to them in an indissoluble alliance ; and hence it may be expected that the image of man will be reflected in them just as the Divine image is reflected by him. And if so, then it is no wonder that there should be manifold evidences of life and intelligence around and beneath man, and that these evidences should be *perfect* in their degree, because the lower forms of creation are not revealed to us as having partaken in the fall of man, or at any rate they are not revealed to us as having fallen in the same manner. And if the lower forms of creation have not fallen in the same sense that man has fallen, it is to be expected that the several vital phenomena which belong to these forms should be perfectly adapted to the conditions in which the forms are placed, and that any intellectual phenomena should partake of the character of *instinctive acts*. Indeed, all vital phenomena, high or low, must take place with perfect regularity under the same circumstances, because there is no perverted will to mask the manifestations of that perfect law of which the vital phenomena are the signs.

We believe, indeed, and we believe unhesitatingly, not only that there is no discrepancy between the teachings of Holy Writ and the teachings of nature, but we believe also that the mystery of nature will remain a mystery until philosophers will consent to listen to the teachings of Holy Writ. It is not enough to seek after a common law in the way in which it may be sought after in nature alone ; but it is necessary, even as a scientific question, to pursue the subject beyond—far beyond—and to do this with a view to know the Lawgiver as well as to comprehend the law. "A little philosophy," says Bacon, "inclineth man's mind to atheism ; but depth in philosophy bringeth men's minds about to religion." It is not possible, indeed, to ignore religion in scientific inquiries, and to attempt to do so is to forego the possibility of attaining to the highest generalization—a generalization which gathers into one principle all phenomena, vital and physical, and which con-

nects that principle with a guardian Deity in whom we live, and move, and have our being.

“A pagan, kissing, for a step of Pan,
The wild-goat's hoof-print on the loamy down,
Exceeds our modern thinker who turns back
The strata—granite, limestone, coal, and clay—
Concluding coldly with—‘Here's law! where's God?’”

So says the late accomplished author of *Aurora Leigh* of the modern thinker in geology; but if this be true of him—and who can doubt it?—how much more true must it be of the modern thinker in medicine.

We have chosen to dwell upon these topics—even at the risk of provoking a feeling of dissatisfaction in the minds of some of our readers—because we are firmly convinced that much of the present uncertainty in medicine must continue until medical men set themselves seriously to realize law, or principle, in nature. It is not, it cannot be enough to exercise the powers of observation, and to indulge in a casual reflection now and then; and it surely must be necessary to exercise the thoughts as much as the eyes and fingers. Far be it from us, however, to discourage observation, and to depreciate diagnosis and mechanical skill; on the contrary, we would excuse no shortcomings in these respects, but we would require that the powers of thinking should be cultivated in a systematic manner, eventually, perhaps, by a definite course of lectures, in which the object was to set forth the various arguments by which the unity of law in nature could be demonstrated.* We know it is no light thing to multiply the labours of the already overworked student, but we believe that a few lectures might be so arranged as to direct him to, if not to put him in possession of, a principle, of which even the knowledge of its existence would materially help him in mastering his profession. We believe, moreover, that a course like this would, if carried out honestly, be the means of counteracting, *on scientific grounds*, those mechanical and sceptical notions which have practically divorced religion from the thoughts of the student, and left him to grope his way, without any other guide than that of his own blinded reason, among the terrible phenomena of disease and death.

* Professor Laycock has paved the way to such a course in his Lectures on Medical Psychology in the University of Edinburgh, and his admirable work *Mind and Brain*, although written specifically for the student of medical psychology and the general student of mental science, should be read by every student of medicine whatever, as a masterly exposition of medical philosophy.

ART. II.—THE CASE OF THE EGYPTIAN FRIGATE AT LIVERPOOL, WITH REMARKS ON THE CAUSATION OF FEVERS, &c.

By GAVIN MILROY, M.D., F.R.C.P.

THE history of this vessel, and the events connected with her arrival in the early part of the present year, were altogether too important, in a public as well as in a professional point of view, for them to be allowed to pass out of memory with their occurrence; they well deserve a permanent place in medical literature for future reference and instruction. Fortunately, a detailed narrative of all the leading particulars of what took place at Liverpool was read at the last meeting of the Epidemiological Society, and will, it may be hoped, be published in their Transactions: it was from the pen of Dr. Duncan, the able Medical Officer of Health of that town.

As several of the most interesting questions of sanitary science, and of sanitary practice too, are involved in the circumstances of the case, it may be useful to devote a few pages to their consideration, in the hope of attracting more and more the attention of the profession to the great subject of preventive medicine. And, first, for a brief notice of the history of the vessel:

She arrived in the Mersey, in charge of a pilot, on the 22nd of February, with "a clean bill of health" from Alexandria, which she had left some weeks before. On being boarded by an ordinary Custom-house officer, this official was told by the captain that one man had died on the voyage, and that a few of the men were on the sick list with bowel complaints. The vessel was soon after moved into one of the docks. It was only then discovered that she was in a state of the most disgusting filth and nastiness; the stench in the between-decks was intolerable, and more than eighty of her crew (the entire number being about 300) were ill, many in a hopeless condition, with fever, dysentery, and frost-bites. The native doctor on board was among the number. There was every reason, too, to believe that several deaths had occurred during the voyage from the Mediterranean. The pilot admitted that he had never been well since he had gone on board, and felt certain that he should yet suffer for it. His fears were soon to be realized. Within a few days after the admission of the vessel into the dock, six deaths took place on board. At the same time, thirty-two of the worst cases were sent to the Southern Hospital; the poor creatures were indescribably filthy, and swarming with vermin. Most of them were suffering from the

worst form of alvine Flux, attended at times with extreme prostration, hot skin, low muttering delirium, and involuntary discharges; some were affected with typhoid pneumonia, and others were frost-bitten in their lower extremities, gangrene of the toes and feet having taken place in three or four instances. That the poison of genuine Typhus existed among the sick cannot be doubted, although its presence in a distinct and uncomplicated febrile form was not recognised, in consequence of it being associated with the prevailing dysenteric affection, and masked in its outward manifestations by the swarthy complexion and begrimed skins of the Egyptians, from whom, moreover, no intelligible account of their sickness was obtainable. It would, indeed, have been strange if the febrific virus had not been there, for all the ordinary elements of its generation were in full force among the wretched crew, huddled together in the filthy, unaired between-decks of a foul ship, half-starved and worse than half-clothed. Fever, nascent or developed, simple or complicated, will, it may be taken for certain, be as infallibly developed in such an atmosphere as mildew will form on the damp walls of a shut-up room; nor will aught securely prevent its manifestation in some form or another among the victims of such exposure, but their prompt removal into a pure atmosphere, with a continuous, free, and ample aeration. Unless this last-named precaution be taken, the disease may spread, even after the removal of the sick from the primary focus, to other persons—more particularly to strangers—who are brought into close proximity with them.

But to proceed. Although the wards where the sick were placed seem to have been overcrowded, and the ventilation appears to have been decidedly imperfect, the change from the foul ship to the clean hospital was at once beneficial; most of the patients rapidly recovered; three only of the worst cases of dysentery proved fatal, one within a few hours after admission. But the hospital attendants did not escape the danger of breathing the infected atmosphere. Three of the medical officers, two nurses, and a porter of the establishment sickened with fever (typhus) within a week or so, I believe, of the admission of the Egyptians; two of the cases had a fatal result. Some of the patients, too, in other wards were attacked; one was a man who had been admitted several weeks before with fractured thigh. He recovered; but the chaplain, who had visited him and other patients, died after an illness of twelve days. And such was the alarm and anxiety caused by these events, that it was judged advisable to close the hospital for several weeks in order to have it thoroughly purified.

But the poisonous effects of the pestiferous ship were not confined to the hospital; and this part of the story is not less instructive

than that just recorded. When the sick had been removed out of the vessel to the hospital, the rest of the crew—at least, all of them that had strength to walk—were sent to one of the public baths in the town to wash themselves, and get rid of as much of the filth and fœtor clinging to their bodies and clothes as possible. Between the 26th of February and the 1st of March, more than two hundred went to the baths. On the 2nd of March, one of the bath attendants was attacked with the first symptoms of fever; he died after twelve days' illness. In the following week, two other attendants sickened; they recovered. The baths, too, as well as the hospital, were closed for a time.

I must not omit to mention, that the pilot also had been taken ill at his own house, a few days after landing from the ship, with a bowel complaint followed by fever, of which he sank after between two and three weeks' continuance. He had said from the first, "We shall hear more of this ship yet!"

Besides the pilot, two other persons who had gone on board were attacked; but both recovered. Neither in their case, nor in that of any of the other persons attacked with the fever, whether in the hospital or at their own homes, did it spread to any member of their families or attendants.

Here ends the medical history of the ship as regards Liverpool; but the record of sickness and death connected with and arising from her, does not stop here. The crew, with the exception of eleven or twelve who remained in hospital, were shipped on board another Egyptian war steamer at Birkenhead, which sailed for Alexandria on the 15th of March. The crowding was, of course, extreme, for the vessel had her own crew as well as that of the frigate which remained behind for repair.* During the voyage, a great deal of sickness prevailed on board, and numerous deaths—by one account thirteen, by another account twenty-seven—had taken place before she reached Malta. On arrival there, the captain, three engineers, and one or two other persons, all Englishmen, were labouring under typhus fever. Many of the Egyptian sailors also were on the sick list; but whether they were affected with the disease in its distinct and simple form, or associated and commingled with dysentery or other more obvious malady, it is not possible, from the want of accurate information, to say. All the sick were removed to the Central Hospital on shore, where several died, among others Captain Lawson and another Englishman. While the frigate lay at Malta, an engineer resident there

* It has been stated that none of the workmen subsequently employed in repairing the frigate at Birkenhead experienced any ill effects from being on board; but, of course, before the repairs were commenced, the foul ship must have undergone a thorough cleansing and disinfection.

was engaged for several hours on board repairing the engines ; he sickened with fever soon after leaving her, and the disease proved fatal. She left on the 3rd of April, and reached Alexandria on the 7th. Numerous fresh cases of disease occurred during the voyage ; upwards of thirty sick were sent on shore on the day of arrival, suffering either from fever, or from dysentery, rheumatism, &c. It appears that Said Pacha, the Viceroy, went on board immediately afterwards, turned out all the crew, replacing them with fresh hands, and that after the ship was thoroughly cleaned she put to sea. After this, nothing more, of course, was heard about her.

And what now are the lessons to be drawn from the foregoing narrative ? First of all, it adds another well-marked instance to a host of similar ones on record of genuine Typhus fever, as well as of malignant Dysentery, becoming developed spontaneously, or, in other words, being generated *de novo* among persons previously healthy when they are crowded together in a foul unrenewed atmosphere, charged with the noisome exhalations from their own bodies,—and especially when the aggravating influences of unwholesome or defective food and of physical and moral depression are in action at the same time. It is necessary that this truth should be clearly and unhesitatingly recognised by the profession, as there still seems to be an idea—not, indeed, in general distinctly or definitely avowed, but only implied under such expressions as a “specific poison,” “essentially contagious,” &c.—in the minds of many medical men, that a disease which possesses the property of self-propagation from the sick to the well must always arise from, or be somehow or other connected with, an antecedent example of its existence.

But this supposition is quite untenable as respects the case now under review. There was no disease whatever among the men when they left Alexandria, nor, I believe, for some time after sailing from Malta. Typhus is not common in Egypt. There can be little doubt but that dysentery was the disorder which broke out at first among the crew ; the foul air, bad food, and insufficient clothing would inevitably produce that. Then the state of the between-decks would necessarily become worse and worse ; and as the weather grew colder, the poor wretches would huddle together more and more to keep themselves warm, the atmosphere in which they were immersed becoming of course every day more putrescently abominable. This is the true medium for the breeding of the typhus poison, and in which all maladies acquire its impress and character. Ordinary dysentery then becomes a typhous dysentery, ordinary pneumonia a typhous pneumonia, and ulcers and common frost-bites then run into hospital gangrene. Such was the case with the crew of the Egyptian

frigate, and such, too, it may be added, was the case, on a wider and more terrible scale, with the allied armies in the Crimea during the disastrous winter of 1854-5. It was the self-engendered element of typhus, superadded to the self-engendered element of scurvy, which was the true cause of most of the dreadful mortality throughout the whole of that memorable campaign. The two services are continually illustrating and throwing light upon each other as regards the ætiology of disease, and nowhere certainly will the student of our profession find more interesting and conclusive evidence respecting the genesis and the aggravating causes of many zymotic distempers than in the records of nautical and military medicine. These records deserve to be better known than they generally are; and assuredly no one acquainted with their contents can for a moment have a doubt on the point now under notice. Its truth, indeed, is a recognised verity. "Air," says Sir Gilbert Blane, in his classical discourse on the health of the British navy, "contaminated by foul and stagnant exhalations, particularly those from the living human body, is the ascertained cause of typhus fever—known also by the name of jail, hospital, and ship fever—which has been a more grievous and general source of sickness and mortality in the navy than even the scurvy;" and he adds, "the dysentery, which stands next in order in point of fatality, is also generated and propagated by the want of cleanliness and ventilation."* Bad food and insufficient clothing have only to be added, and then we have all the most deadly agencies at work together for the destruction of human life. The recent autobiography of Sir James MacGregor—unhappily far too meagre in professional memoranda—will give the reader some idea of the waste of strength

* It has been a matter of discussion whether the fever and the dysentery thus engendered under the same circumstances are to be regarded as generically distinct diseases, or whether they are only different results of the same morbid virus acting on diverse constitutions of body, and influenced it may be also by ethnological and climatic peculiarities. There seems to be often a sort of mutual balancing in the prevalence of fevers and fluxes. When and where the one are most abundant, the others are less so; and *vice versâ*. In some tropical countries, fevers are the more dominant endemic disease, and dysentery is but the occasional and partial one; in other similar countries, dysentery is the endemic *par excellence*, and fevers play but a subordinate part. Again, the outbreak of some bad fevers is preceded by an unusual prevalence of bowel complaints, which become less frequent and severe as the febrile epidemic becomes more completely developed. This has been remarked in the case of yellow fever epidemics. It has often been observed, too, that diarrhoeal and dysenteric patients have escaped attacks of a prevailing fever. On the other hand, the sudden cessation of an alvine flux is apt to be followed by fever symptoms, as in the case of Asiatic cholera. But without pursuing the subject, I will only add that Sir John Pringle, and other experienced army and navy physicians of last century, were of opinion that patients affected with malignant dysentery are apt to communicate typhus fever as well as the dysentery to other persons near them. A like remark may be made as to hospital gangrene.

and life among our troops at the end of last century and the beginning of the present one, by the continual occurrence of typhus fever in consequence of crowding the men together like cattle in confined, ill-aired barracks and hospitals. One of the greatest difficulties with which Wellington had to contend, during the early years of the Peninsular war, arose from the enormous proportion of the sick in his army, attributable mainly to this cause.

What is true as to the spontaneous generation of typhus under the sort of conditions mentioned, holds equally true, allowing for modifying circumstances, in respect not only of typhoid or enteric fever, and of all alvine fluxes, but also of the malignant or pestilential fevers which appear in other climates and regions of the earth in certain years or seasons. That the genuine Oriental plague is liable at times to be engendered under the very same circumstances of unwholesomeness and squalid wretchedness as typhus is engendered in this country, was shown beyond all contradiction by the development, three years ago, of the disease in the wretched hovels of the half-starved Arabs at Benghazi, on the African coast, after an absence, be it remembered, of any trace of the pestilence for twelve or fourteen years at the least, and when, moreover, no trace of it existed in any other part of the Levant. The case must be regarded as a demonstrative one, even if there was no other evidence of the sort on the subject, which, however, is far from being so; and on this account it deserves a place in the repertory of ascertained and authentic medical facts. And so, too, with the pestilence of the warm regions of the New World. Every now and then Yellow fever is springing up in different spots and regions, independently of all traceable connexion with localities already infected,—not unfrequently, indeed, after considerable intervals of absence, but, nevertheless, almost invariably under the like local physical conditions to which reference has been made. Nautical and military experience on several occasions of recent years and in different places, as at Demerara, Brazil, Barbadoes, and more especially at Bermuda, appears to be quite decisive upon this point. That, for example, this fever became developed spontaneously in the crowded between-decks of the foul prison hulks at Bermuda in 1853, must be considered as an incontestable fact, as clearly and indubitably so, indeed, as the typhus on board the Egyptian frigate. And so it has been in a multitude of other instances both in the navy and in the merchant service. The fever in the *Eclair* appeared at first as the ordinary endemic remittent fever of the African coast, and subsequently lapsed, under the pernicious influence of an impure atmosphere on board, into the worst form of the malignant pestilence.

The second lesson taught us by the case of the frigate is, that certain diseases which are generated on board a foul vessel are apt to become highly contagious. Never was a stronger proof afforded of this fact than by the events of the present case. The only sure test of a disease being communicable, be it ever remembered, is when it spreads to healthy persons in attendance on, or in close proximity to, the sick after the latter have been removed away from the locality where they were attacked, and where the disease may have been engendered. The pilot and the two other persons at Liverpool, who caught the fever after having gone on board the infected vessel, cannot properly be regarded as indubitable instances in point; for they were exposed to the febrific polluted atmosphere which was the *fons et origo* of all the mischief. And so it is often on shore on visiting the abodes of the poor where a case of fever has sprung up; the other inmates of the house or a casual visitor may become subsequently affected not necessarily from the patient himself, but from the operation of the very same cause which primarily produced it. At any rate, there must always be some room for doubt as to the real and efficient cause of the spreading of the disease under such circumstances. But all hesitation must cease when the sick have been removed to a distance, and when the attendants, who have never visited or been near the spot where they had been taken ill, become subsequently attacked. Now, this was strikingly the case in respect of the medical and other attendants in the Southern Hospital, and also at the public baths. The poison of the fever must have been conveyed in the bodies, and most probably also in the foul clothes of the Egyptians, and been thus transmitted directly to the persons who were brought into intermediate intercourse with them. The fact cannot be gainsaid or explained away; it is patent as the noonday.

That so many of the attendants in the hospital were attacked would have indicated an extraordinary virulence in the contagious property of the fever, if the wards had been well ventilated, and the sick been duly dispersed. But that the contagion was really not more virulent than usual is conclusively shown by the circumstance that the disease did not spread to any of the inmates or attendants of the infected who were treated at their homes; affording thus another illustration of the facility with which the extension of the poison may be arrested by simple means always at our command. And so it is with the other forms of malignant fever to which allusion has been made. In respect of the yellow fever, a disease which, from its recent disastrous effects in our ships of war as well as in our merchantmen, deserves especial attention at the present time, the effects of free and ample aeration in a wholesome spot in reducing to zero its contagious property are even more prompt and decided than in respect to typhus.

Hence it is that in a well-ventilated hospital, the spreading of this fever from patients received from infected ships is all but unknown. Not a single instance has occurred of recent years at the large Marine Hospital of New York, in upwards of a thousand cases of the fever treated in its wards. No evidence can therefore be more decisive. That, however, the utmost risk is incurred by going on board an infected vessel is equally true in regard of yellow fever as of typhus fever. It may be remembered that, in the case of the *Eclair*, the pilot who boarded her as well as two or three medical officers who had volunteered their services to treat the sick on board, were speedily smitten with the fever and died; but that no sooner were all the crew, sick and well, removed out of her and placed in roomy, airy hulks than all trace of the disease disappeared. The case of the *Icarus* the other day at Port Royal affords, on the one hand, another striking instance of the extreme danger of persons going on board a fever-smitten ship, and on the other hand, of the little risk, if any, of the disease spreading to the immediate attendants on the sick in a well-aired and spacious hospital.

It is high time, surely, that the endless controversies of medical men on the subject of the contagion of this and other like fevers should cease; for they continue to bring discredit on medical habits of reasoning, if not upon medical truthfulness and impartiality in dealing with facts. The division of doctors into "contagionists" and "non-contagionists" has long appeared to me to be about as rational as would be the division of geologists at the present time into the old rival sects of Neptunists and Vulcanists. And might not the conduct of those medical men who can see nothing but contagion as the cause of the spreading of a disease, and of other medical men who, because they have satisfied themselves that the disease is apt to appear under certain external conditions independently of any traceable previous case, refuse to admit the operation of contagion at all, be fitly paralleled by the conduct of geologists, who still persisted in maintaining that all the phenomena of the earth's surface were referrible to the exclusive action of water or of heat.

If the logic of facts is to be worth anything in the guidance of our judgment in such matters, it will be difficult to come to any other conclusion except what appears to be the very obvious one, viz., that certain diseases are both generable *de novo*, and are also propagable by communication of their poison, under certain conditions, from one person to another. If such be the truth, the real point of practical importance is to determine, on every outbreak of the disease, the extent and potency of each of these exciting causes in the development and extension of the malady. Until medical men come to take this view of the subject, there

will be no end, it seems to me, to the constantly recurring discussions and disputes on questions whose solution is surely quite as obtainable by patient observation and careful, candid deduction as any other questions within the domain of Natural History. There are few or any of the class of zymotic febrile diseases which might not be shown, upon tolerably good evidence, to possess at times, and under certain insalubrious conditions, the property of communicability; and, therefore, if instead of continually propounding the question—"Is such a disease contagious?" we were in future to be more in the habit of asking ourselves such questions as these—"When and under what circumstances did the property manifest itself?" and "What part did it play in the diffusion of the disease? was it relatively great, or was it relatively inconsiderable as compared with other agencies?"—there is every reason to believe that the discovery of useful truth would be promoted, and the value of professional opinion would be more generally esteemed.

In the case of the Egyptian frigate, there can, I should think, be scarcely any difference of opinion—viz., 1. That the fever was generated or self-engendered on board, and that its diffusion among the crew was mainly caused by the poisonous atmosphere from the crowding of them together in filth and misery; and, 2. That its extension to the attendants in the hospital and baths on shore was due to the transmission of contagious miasmata from the sick and their clothing.

Lastly, some useful lessons in sanitary practice may be gathered from the case we have been considering. It suggests very forcibly the prime and paramount importance of thorough aeration as the only reliable means for preventing the spread of fever when it has once become developed on board a ship. The between-decks of most vessels is, perhaps, the very worst place in the world for the detention of fever patients; nor can this be wondered at when we remember that, besides the great difficulty of obtaining and maintaining a continuous renewal of fresh air, there are generally some unpleasant emanations from the hold and bottom of a ship which must tend to increase still more the vitiation of the atmosphere that is breathed. And certainly nowhere have fevers proved more terribly destructive than at sea, in emigrant and troop ships; and occasionally also in our ships of war. Neither will such disastrous consequences be avoided in the future until the great principle be more generally recognised, and more assiduously acted upon, that the only safety, upon the appearance of sickness, consists in enlarging the breathing space to all on board to the utmost, and at the same time rendering the ventilation more complete, *especially at night, and during the hours of sleep*. The dispersion of the well and unattacked is of

even greater importance, in a preservative point of view, than the *segregation* of the sick, however right and necessary this precaution also always is. It would be most useful if fever patients were more frequently accommodated, under proper shelter, on the spar-deck, where they can always obtain a free and pure atmosphere, without which it is in vain to talk of medical treatment, as has been over and over again proved by experience in every climate. An excellent arrangement for this purpose has recently been adopted in some of the West India mail steamers, on the recommendation of Dr. Wiblin, the enlightened superintendent of quarantine at Southampton, in the event of the occurrence of yellow fever on board. Canvas huts, capable of holding a couple of low iron bedsteads, can be rigged at once on deck immediately in front of the foremast, where the sick can be watched and tended without difficulty. This plan might be adopted with benefit in vessels of war, more especially in steamers, while every available spare foot of space on the spar and upper decks should be at the same time utilized for the wider distribution of the rest or unattacked portion of the crew, whenever that destructive malady threatens to prevail.

The spreading of fever to so many persons in the Liverpool hospital affords in itself pretty positive proof that the ventilation of the wards in that institution stands in need of improvement. There might, indeed, have been insufficient space allowed to each patient; for a thousand or twelve hundred cubic feet is certainly not too ample space under such circumstances. But it is always to be remembered that one half this extent, provided there be the means for maintaining a constant and uninterrupted renewal of the air throughout the twenty-four hours, is far more safe and salutary than the full extent with defective aeration. The construction and arrangements of hospitals and infirmaries have been pressed on the attention of medical men and of the public generally, by Miss Nightingale, with admirable good sense and ability, and certainly not before the instruction was wanted, as every one acquainted with many of our provincial and metropolitan hospitals must admit. The most common defect is in the windows; they are either badly placed, or are insufficient in size, or do not open aright and with ease, or perhaps only open in one or two small frames, as in that worst kind of all windows for hospitals, schools, &c., those on the Gothic or old English style of architecture, with stone divisions and latticed glass, to the exclusion generally both of free light and air.

In conclusion, I would suggest that the case of the Egyptian frigate shows that the sanitary police and sanitary superintendence over the shipping in our great commercial ports is far from being so efficient as the interests of the community require.

Dr. Duncan, the able medical officer of the medical committee of the town of Liverpool, remarked on this point in his first report:—"The medical officer is of opinion that there is no ground whatever for the apprehension that the disease is likely to spread through the town in consequence of what has occurred. But it is a matter worthy of consideration whether some arrangement ought not to be adopted for giving immediate notice to the proper authorities of the existence of disease among the crews of ships arriving in the port, in order that steps may be taken to prevent its further extension." That some arrangement of the sort is needed, both for the reason mentioned and also for the purpose of guarding against exaggerated alarms both among ourselves and in foreign countries, must strike every one. Such an event as that of the Egyptian frigate might have led to a stringent and prolonged embargo upon our commerce and general intercourse in many places abroad, more especially as the dreaded name of "plague" was at first actually applied to the disease. On much slighter grounds, an interdict of twenty, thirty, or forty days has often been imposed on all shipping arriving from a port where such an occurrence had taken place. But apart from this consideration, it is clear that much distress and evil would have been avoided had the proper precautionary measures been carried out on board, under the direction of an experienced medical officer, after he had ascertained by personal inspection the state of the ship and the crew, immediately upon her arrival. Such a responsible officer would, besides other precautions, not have allowed the sick to have been landed with all their filth and filthy infected clothes on them: previous ablution and clean clothing would of course have been enjoined. Neither would he have permitted the rest of the crew to have carried all their abominations on shore, to get rid of them in the public baths of the town. Much preliminary cleansing and purification might easily have been done on board. Moreover, the ship herself would have been subjected to no end of sluicing and disinfecting before she was admitted into a dock where there were other vessels. Everything, in short, indicates, as it seems to me, the great want of the presence of a sanitary medical officer, whose duty it should be not only to board and inspect all vessels arriving with any sickness among the crew or passengers, and to enjoin the adoption of the hygienic measures required alike for the benefit of the sick and others on board, and for the welfare of the community on shore, but also to maintain a supervision over the condition as to health of the shipping at all times,—on arrival, during stay, and before departure—in our great commercial ports. That there is a large amount—much larger than is generally imagined—of ill-health and positive disease, ending in premature dis-

ablement if not in death, in our mercantile marine, is well known to all whose attention has been drawn to the subject; nor is it less notorious but much, very much, of it might be easily avoided by timely discovery and attention. A very great deal might be prevented altogether, for many of the causes of the evil are abundantly obvious; and of these none is more potent than the defective and bad accommodation of the men. Without enlarging upon this important subject, I will only now remark, that if the practice of berthing the crew in houses upon deck, as is done in all the best American ships, were generally adopted in our merchant vessels, not only would the comfort of the men be greatly increased, but their vigour of health and their effectiveness for hard work would be in no small degree promoted. And as the mere temporary loss of the service of only one or two of the hands out of a merchantman's crew often comes to be of serious moment in a long voyage or during boisterous weather, the matter is clearly one of no small moment in a national point of view.

ART. III.—THE ÆSTHETICS OF SUICIDE.

IN a previous number of this Journal* we endeavoured to show that the poetical literature of this country did not, as certain continental writers maintain, exercise a primary influence in the development of that æsthetical treatment of suicide which has been one of the most curious phases of the literary history of the past eighty years. We attempted also to trace the early history of the modern æstheticism of suicide. We propose now to examine the latest manifestation of this æstheticism as exhibited in recent French literature.

In order more clearly to indicate the relationship existing between the earliest and latest examples of the æsthetical treatment of suicide among the moderns, it will not, perhaps, be amiss, in the first place, briefly to recapitulate the history of its development.

Throughout the latter half of the last century, a remarkable increase of suicide in Europe occurred contemporaneously with a progressive decline in the power of religion and of the Church over men's minds, a gradual deterioration of morality, and the

* No. II. Art. 2. *The Classic Land of Suicide.*

rise and spread of a philosophical scepticism, which undermined all that had previously been looked upon as necessary for the stability of society. Towards the termination of the century, as Carlyle has forcibly said, "Whatever belonged to the finer nature of man had withered under the Harmattan breath of Doubt, or passed away in the conflagration of open Infidelity; and now, where the Tree of Life once bloomed and brought forth fruit of goodliest savour, there was only barrenness and desolation."* A profound disquiet, a necessary consequence of the loosening of those holier ties which bind men to life, had sprung up widely in the minds of thoughtful persons, and begotten a life-weariness or indifference of which suicide was the logical and too often practical sequence.

It was under such circumstances that Goethe's *Sorrows of Werther* appeared. This work, chiming in with and giving for the first time a definite expression to the prevalent feeling of the moment, seized in a remarkable manner upon the hearts of men. Werther is the type of a refined but ill-regulated, ill-balanced spirit, which, imbued with the literature and scepticism of the epoch, conceives the chief aim of existence to consist in sensuous enjoyment. He acknowledges no higher duty than the gratification of his own pleasures, no higher rule of conduct than such as most readily falls in with the pursuit of that duty. He looks with contempt upon the pursuits, hopes, and pleasures of everyday life, and seeks an ideal life which clashes at every turn with the real. Hence ever-recurring dissatisfaction and disgust both with himself and with all around him. But, "hemmed in as he is, he ever keeps in his heart the sweet feeling of freedom, and that this *dungeon* can be left when he likes."†

These are the salient points of Werther's character, and consistently with them he is represented as cherishing an adulterous love for the wife of a friend, justifying that love, and to crown all, advancing its want of gratification as a seal of martyrdom, and a sure passport to eternal bliss.

"Everything," Werther writes, "passes away, but a whole eternity could not extinguish the living flame which was yesterday kindled by your lips, and which now burns within me. She loves me! These arms have encircled her waist, these lips have trembled upon hers. She is mine! Yes, Charlotte, you are mine for ever!

"And what do you mean by saying Albert is your husband? He may be as for this world: in this world it is a sin to love you—to wish to tear you from his embrace. Yes, it is a crime, and I suffer the punishment—but I enjoy the full delight of my sin. I have inhaled a balm that has revived my soul. From this hour you are

* Miscellanies; Art. *Goethe*.

† Letter, 22nd May.

mine; yes, Charlotte, you are mine! I go before you. I go to my Father, and to your Father. I will pour out my sorrows before Him, and he will give me comfort till you arrive. Then will I fly to meet you. I will claim you, and remain in your eternal embrace, in the presence of the Almighty.

"I do not dream; I do not rave. Drawing near to the grave [he is writing on the eve of suicide] my perceptions become clearer. We shall exist; we shall see each other again; we shall behold your mother; I shall behold her, and expose to her my inmost heart. Your mother—your image."*

That the *Sorrows of Werther* should have been received with avidity on all hands, and rapidly multiplied in every Christian language, is one of the most significant indications which could be given of the peculiar state of society at the period in which the book was written. Apart from the charm which belongs to the great and enduring literary merits of the work, and from the fact that it first gave expression to the vague and undefined disquiet (the "nameless Unrest," as Carlyle has it) which had settled down upon men's minds, there is another and equally, if not more, important element which contributed to the immediate and amazing popularity of *Werther*. While the widely-spread scepticism of the period had unseated all the most cherished and holier beliefs of humanity, it had substituted nothing capable of satisfying those deep-rooted feelings which underlie, and are the source of those beliefs. The moral attributes of humanity having been frittered away, the conceptions of vice and virtue became regulated by individual or general expedience, and as a consequence, the former assumed a quasi-virtuous, the latter a quasi-vicious aspect. But a degraded virtue was ill adapted to satisfy the irrepressible yearnings of the heart after something purer than a mere sensuous delight in existence; and the virtuous garb in which vice had been clad sat too awkwardly upon it altogether to hide its revolting nature. Hence neither the thoughtful nor the thoughtless, who had yielded to or trifled with the philosophical scepticism of the time, felt at ease with doctrines which ignored, but could not extinguish, the deep-set faith that good and evil, right and wrong, were something more than mere matters of expediency; which were all-important to the vicious, but which left the virtuous in the lurch; and which reduced man to the position of being solely the most intellectual brute in creation.

Under such circumstances *Werther* came as a New Gospel. It threw a veil of exquisite sentiment over the heartless and repulsive teachings of scepticism, and seemingly linked them to

* Letter, Dec. 20.

the holiest feelings of our nature. With a subtle ingenuity worthy of the refinement which Mephistopheles subsequently boasted the devil had undergone as civilization had advanced,* Werther stopped short of avowed atheism, and substituted an æsthetical deity for the God of Christianity, pressing ingeniously into service the familiar phraseology of the Christian religion, and prostituting it to the service of vice. Thus Werther supplied that element of feeling which had been wanting in the scepticism of the day, and by retaining the idea of Deity and the language of religious faith, it apparently reconciled the profession of virtue to the practice of vice—neatly dovetailing the one into the other.

To what extent Werther influenced the educated classes of the people is best shown by the effect which the book exercised upon men of letters. "Infusing itself into the core and whole spirit of Literature," writes Carlyle, "Werther gave birth to a race of Sentimentalists, who have raged and wailed in every part of the world; till better light dawned on them, or, at worst, exhausted Nature laid herself to sleep, and it was discovered that lamenting was an unproductive labour." Of these Sentimentalists Byron was the chief—the strongest, the wildest, and the gloomiest.

The impetus given to suicide by the publication of Werther was great. "The eternal law has done nothing better than this," Seneca wrote, "that it has given us only one entrance into life, but a thousand ways of escaping out of it. Excellent is the condition of human life; since nobody can be miserable but by his own fault. Does life please you? live on. Does it not? go from whence you came. No vast wound is necessary; a mere puncture will secure your liberty. It is a bad thing, you say, to be under a necessity of living; but there is no necessity in the case. Why not? because many, short and easy, are the paths to deliver you from it. Thank the gods, nobody can be compelled to live; we spurn at such a necessity. If the mind be sick, it is its own fault; it may soon put an end to its misery. Do you see that

* "Refinement, too, that smoothenes all
 O'er which it in the world has pass'd,
 Has been extended in its call,
 And reached the devil, too, at last.
 That northern phantom found no more can be,
 Horns, tail, and claws, we now no longer see;
 As for the foot—I cannot spare it,
 But were I openly to wear it,
 It might do greater harm than good
 To me among the multitude.
 And so, like many a youth beside,
 Who bravely to the age appears,
 Yet something still contrives to hide,
 I've worn false calves for many years!"—*Faust*.

precipice, that river, that well? you will find liberty or freedom from misery at the bottom. Look on that tree; liberty hangs on its branch; or do you ask, which is the road to liberty? your heart, your throat, and every vein in your body. Every one ought to make his life approved by others, his death to himself. That kind of death is best which pleases most. If a man can contrive to kill himself easily and without much pain, he ought so to do; but if prevented from this, he must use more ingenious and painful methods. There never can want contrivance to die, where there is inclination. It is most unjust to live by theft, but to steal an opportunity of dying is very becoming and beautiful.”*

In this wise also Werther taught the becomingness and beauty of suicide, and a like lesson flows, directly or indirectly, from the writings of the Sentimentalists. But it is worthy of note, that the ancient Stoics justified suicide solely as a means of escape from the ills which might overtake the virtuous—those of a just and approved life; but the modern Epicurean seeks to justify the act chiefly as a deliverance from the miseries induced by vicious habits.†

In England the moral atmosphere has been in a great degree purged of the suicidal infection arising from the Werther school of literature, but such is not the case in several continental States. In France, for example, works of this school have been multiplied, and their influence has, if anything, gained ground

* Ep. lxx.

† “The suicide of old (when his death assigned him to any degree of credit, and not rather to infamy) despatched himself, because he had been unsuccessful in the field of battle, had lost a town or an army; the modern one does the same because he has lost a throw on the dice; the former staked his life on the event of a battle, the latter does the same on the turn up of a card. The ancient hero put an end to his mortal existence rather than yield his person to grace the triumph of conquest; the modern man of honour departs out of life to defraud his injured creditors. The man of ancient virtue fought in the cause of public liberty and would not breathe after that expired; the man of modern dissipation as strenuously engages on the side of licentiousness, and when no longer able to maintain its dissolute empire, rushes indignant from the scene of sensual existence. Women of old died by their own hands to preserve an untainted chastity of manners; while the men of modern spirit voluntarily hazard their lives in defence of female prostitution. A disinterested love of their country led men of old to destroy themselves rather than offend against the dignity and authority of wholesome institutions; a complete love of themselves inspires many of the present generation to injure the laws of their country in a thousand shapes, and then to fly from the execution of their sentence by the stroke of self-murder. The suicide of the ancients was frequently grounded on some principle of genuine honour, dignity and patriotism, while the self-murder of the moderns too of ten originates in mere pride and disappointment, in sensuality, extravagance, and consequent penury. In short, as the one frequently arose from some exertion of probity and justice, from some principle of honest worth, so the other is to be traced to the haunts of the gamblers, to the brothels of vice and profligacy; it owes its birth to the extinction of virtuous principles, its constant and alarming growth to the destruction of all pious and religious impressions.”—*Moore on Suicide*, vol. i. p. 284.

from year to year; and at the present time *Wertherism* (so to speak) flourishes vigorously in that country. Scepticism clothed in a garb of religious phraseology, sensuality culminating in the apotheosis of prostitution and adultery, and suicide elevated to the dignity of a legitimate panacea for all the ills of life, constitute the staple of perhaps the most popular portion of the current romance and dramatic literature of France. To the demoralizing effects of this literature, French writers of note* justly ascribe an all-important influence in the production of suicide—tracing to this source in no small degree the preponderance of suicides among the young in Paris (the chief focus of *Wertherism*), as well as the progressive increase in the amount of suicide throughout France since the commencement of the century.†

If we would learn the character of the existing æsthetical literature of suicide, a typical example is to be found in Maxime du Camp's *Mémoires d'un Suicide*.‡ This work is cast in a somewhat similar literary mould to the *Sorrows of Werther*, and its hero is a new Werther, after the most novel and approved Gallic model. We first make his acquaintance, in a highly melodramatic fashion, in Egypt, on the route from Kenh to Kosseir. Our author is travelling homeward from the Upper Nile and he stumbles across his future hero, who has been vainly seeking distraction in the depths of occidental Asia, in the desert of Kosseir. Pass we over, however, those incidents and details which, although pleasantly spicing the prefatory chapter of the work, have no immediate bearing upon its subject matter. Let it suffice that the new Werther is named Jean Marc, and that he is depicted as being in the prime of life, and as having the aspect of one who was a victim to insurmountable ennui. To use his own phrase, as he sits gossiping freely with his new-made friend at their halting-place:—"He had seized hold of life on the wrong side, and the penalty bore him down perpetually." "Nonsense," is the rejoinder, "every evil has its remedy within itself, and as good men say, every one carries his cross: do you know a happy man?" "Yes," he said; "I have seen one." "Where?" quoth

* See the works of Brierre de Boismont and Lisle.

† See *Journal of Psychological Medicine*, vol. xii. p. 209. The tendency to suicide throughout England is greatest between the 55th and 65th years of life; throughout France, between the 40th and 50th; in Paris the tendency is greatest from the 20th to the 40th years; in London (for the three years 1858—60) from the 40th to the 60th. In 1827 the proportion of suicides to population throughout France was 1 in 20,660. From that year the number underwent a steady increase, year by year, with but few exceptions, and in 1852 the proportion had reached 1 in 9,340.

‡ *Mémoires d'un Suicide*, recueillis et publiés par Maxime du Camp. Paris, 1855.

the friend ; “ the case is rare, and I would willingly seek him to learn his secret.” “ In a village of Nadj,” answered Jean Marc. “ He was a Koord who had been taken prisoner by the Wahabis, in the war against the Pasha of Egypt ; he is condemned to turn the wheel of a Sakyeh from morning until evening. At sunrise he betakes himself to his rude labours, which he performs conscientiously, dreading the cudgel of his master ; when night comes he lays himself down on a mat and sleeps soundly until the following morning.” “ And you think that this wretch is happy ?” “ ‘ If I was still so foolish as to believe in happiness, I would seek it in habit.’ So says Chateaubriand, and he is our master in all things. This wretch, as you call him, is habituated, therefore he is happy.” “ If it is so, it would be well to take his place.” “ No,” is the reply ; “ because I should take the place without having acquired the habit, and so I should fail in my object.” “ You love paradoxes,” said the friend, laughing. “ Less than you believe,” answered Jean Marc, with a sad and serious expression.

Thus they gossip in the desert, and Jean Marc is represented now as indulging in fatalistic doctrines borrowed from the Mahometans, and anon as contending for a transcendental conception of freewill—smoothing over the flagrant contradiction of opinions by the sententious observation that “ All this could be reconciled ” (in what manner we shall see in the sequel).

And so the conversation by an easy transition reverts to the subject of suicide. Is voluntary death permitted or prohibited ? To this question Jean Marc responds in the affirmative. Upon which his interlocutor exclaims, “ Is it right to withdraw any force whatsoever from the course of things ?” “ Certainly,” said Jean Marc, “ if that course carries me where I do not wish.” “ That is fatalism.” “ Yes,” is the rejoinder ; “ but I kill myself as an act of freewill, and thus I re-establish the equilibrium.” And further Jean Marc is represented as saying :—

“ If I kill myself, my suicide is the result, or rather the resultant, of God’s will and of mine. In reality, God thinks in us, since our soul is a direct emanation of his essence. If, then, the thought occurs to me to accelerate the moment that I shall quit my actual form, it is to God that I owe it. I have the power, myself, with my freewill to discuss, reject, or admit it. It is with this as with a disease which is insignificant, dangerous, or mortal, and of which the germ is in us. If this thought arises in me without disturbing me, it is insignificant ; if it inspires me with a deadly resolution, it is dangerous ; if it seizes upon me to the extent of forcing me to carry out my resolution, it is mortal.”

The topics of this conversation amid the burning sands of the desert, and the locality in which it is held, notwithstanding the

accessories of chibouques and coffee, inevitably recal (to the English reader at least) that discourse which Milton represents as being held upon the fiery floor of hell, and in which were discussed—

“——— Providence, fore-knowledge, will, and fate;
Fix'd fate, freewill, fore-knowledge absolute.”

It is no part of our object to discuss the different sentiments and opinions expressed by Jean Marc. We seek simply to describe these sentiments and opinions; but apropos of the notion that the soul is a direct emanation of the Deity and the consequence derived from it, we may fittingly refer to an observation of St. Augustine. He has happily characterized as a “strange madness” that state of mind in which, according to the doctrines of the Manichæans, he at one time held that he was that by nature which God was, imputing to the Deity the liability to err, rather than confess that he had gone astray voluntarily.*

A day's gossip, and each traveller takes his separate way. After long travel, our author, returning to Paris, and not forgetful of his “improvised companion” in the desert, seeks for him. He hears of him from many persons, and in no flattering terms; but cannot meet with him. One speaks of him as a madman, another as a bear, a third as an original, but a fourth most aptly describes him as a “useless being, a natural son of René, reared by Antony and Chatterton.” Presently, however, our author receives a letter from Jean Marc himself, written on the eve of suicide, and enclosing a will by which he appoints him his literary executor. The letter contains the moral of the book:—

“Is it fatality? is it freewill which urges me?” [writes the suicide] “I know not. What is certain is that I am weary, and that I will have done with it. When you receive this letter, all my doubts will have been cleared up, and I shall, perhaps, at last have comprehended the End and the Cause. You will probably remember our conversations in the desert. Is suicide permitted, or is it prohibited? Am I right, or am I wrong? The fact is that I am about to kill myself, that is all.

“If you have the courage to read the notes I send you, you will learn how it happens that although barely thirty I have come to this. . . . Amidst their confusion you will discover this terrible truth, the foolish negation of which brings about my death this day,—that under penalty of unhappiness, it is requisite to follow the exemplary precept which God has laid down in Genesis: ‘Sous peine de mort, il faut travailler.’

“I have imprudently consumed in one hour, by a useless brilliancy,

* Conf. B. iv. sec. 15.

the oil of the lamp which should have burned throughout the night. The darkness has come, and I fear the phantoms. Thus like an infant I throw myself boldly into the arms of my nurse that she may appease my terrors. But I have interrogated in vain the silence and the obscurity, and I can discover no one who can succour me. I depart for future creations, where doubtless I shall live with the experience gained at the price of many miseries. As I have said, I have laid hold of existence on the wrong side, and hence it is that I die disgusted with life without having ever lived. God pardon me, since I was ignorant. . . . Do not pity me; I die with indifference if not with joy, and I feel a great buoyancy of spirit. Few will miss me, and they will hasten to forget me, so that they may quickly relieve themselves of the little portion of pain I may have left to them. I cannot demand a single tear; I know this, and I am pained with it, because I do not escape from that imperishable egotism of the human heart which longs to survive, a loved being, in the regrets of others—regret, that egotism of the living abandoned by the dead. . . .

“Before I finish listen to the counsel of one dying: Work; work without ceasing, work without relaxation, with or without result matters little: but, work! Work is the club of Hercules which crushes every monster.”

This is the moral of the book; truly, a noble one, if rightly understood, and looking well, tricked up with a scriptural text. But mark the sequence:—

“And now,” he writes, “that I am about to receive upon my lips the cold kiss of death, now that all is ended and that in one hour more I shall be stretched out a bloody corpse, if it is asked what thought, what regret, what aspiration opens its wings in my heart? I answer: How happy must that man be who is caressed by a young and lovely wife, and who hears an infant lisp ‘Father!’ He dwells in the country; a verdant sward stretches before his house; when he walks out his wife is at his side and a great dog follows carrying the little child: he knows the joys of family life. How happy must he be who watches through the night, bent over a book, his head full of thought! Ever and anon he rises to gaze upon strange mixtures fermenting in crystal vases: he knows the joys of a scientific life. Happy is the painter working palette in hand! the statuary who chips the marble! the composer who grows pale listening to the melodies which are sung in his soul! the writer who dresses his thoughts in magnificent forms: they know the joys of an artistic life. Happy is the captain whose splendid costume attracts the eyes of the women! He commands soldiers as brave and obedient as himself; he would die bravely to save the frontier or to prevent a dog entering the Tuileries: he knows the joys of glory and subjection. Happy the Secretary of State who unseals despatches that he does not understand, and signs papers that he has not read! He kisses his hand graciously to the ladies; he speaks not, in order that he may have the aspect of reflection, and bends lowly before the powers that be, because he wishes to become minister: he knows the joys of

ambition. Happy the banker who jots down his figures, counts his money, lovingly regards the fifty locks of his strong box, and gains sixty-five per cent. in the most honest fashion possible! He knows the joys of riches. Happy the young man who, when the night comes, with beating heart and light foot, heedless of difficulties, hastens to her he loves and by whom he is loved! He knows the joys of love. Happy all those who are not as I am, all those who are not gnawed by the devouring inquietudes of hopeless dreams."

From this confession we are to learn (and the author's explanation is certainly needed) that the suicide has at length comprehended the impiety of his life, although not of the act by which he is about to terminate it. But how strange the conceptions, how wretched the caricature, of the duties and requirements of manhood! It would be most natural to conceive that the picture here presented to us is a feeble satire; but, as we shall see more fully in the further analysis of this strange work, the artist is drawing in good faith: and the vapid sentimentality is peculiar to the school of literature to which our author's work belongs; while the irony is a characteristic of his hero, who is represented "as adding a corrective, often bitter, to whatever admiration he expresses."

In the foregoing fashion, Maxime du Camp has depicted the matured opinions of his hero. In the subsequent portions of his work the hero is represented as himself recounting, in a series of desultory letters or recitals, the genesis of these opinions, and the history of his life. We shall take up that history at the point where he is left an orphan.

He is still very young, and while suffering from the acute grief consequent upon the loss of an over-fond mother, he is consigned to one of those vast schools where the individual child is left to accommodate itself as best it can to stern general rules and harsh task-work. Naturally delicate and sensitive, crushed by the loss of his home and by the want of all kindness, he becomes moody and retiring, avoids the rough sports and resents the thoughtless indifference of his comrades. He cherishes his griefs apart, and his soul revolts against the unreasoning punishment which follows every shortcoming, however trifling. Presently his feelings assume a more active character, and a bitter hate is engendered in his breast against his masters. He becomes obstinate, heedless, and disorderly, and in the end is looked upon as a hopeless subject, and is opprobriously designated by his teachers, a *cancre*.

But few pleasures brighten his early school days, and these are solely of the imagination. A young comrade, a Corsican, and a somewhat similar spirit, would often while away the hours of rest with wild stories of brigands and descriptions of his sunny home on the shores of the Mediterranean, and thus excite in his lis-

tener's breast immoderate longings to escape from the torturing confinement of school. As he grows older, he presently learns the irresistible charms of romance, dramatic and poetic literature; and, aided by his pocket-money and a readily-acquired trick of smuggling the prohibited books into the school, he indulges without stint in the delicious fictions of the poet and the novelist, and creates for himself an ideal world, which more and more disgusts and renders him discontented with the real.

Even in the lad we thus distinguish some peculiar characteristics of the man. The picture is a sad one, but it must be confessed a true one, and one full of instruction.

Time passes on, and he is in his sixteenth year. A riot, brought about by the senseless severity of one of the masters, breaks out among the scholars, and the ringleaders, of which our hero is one, are severely punished. They determine to escape, and Jean Marc and two others succeed, and for a day and part of a night they are afloat in Paris, subsisting as best they may on the scanty money which they have in their pockets. At midnight they rest themselves on the parapet of the Pont Neuf, wearied and dissatisfied with a day of freedom, in which they had not known what to do with themselves, momentarily dreading capture, and not knowing how to act on the morrow. They sit there long, depressed and silent, each occupied with his own fears, when Jean Marc, glancing at the swift stream beneath them, exclaims, "*Why not die?*"

It was under these circumstances that the first thought of suicide entered into his mind; from this time often to recur. Here it was the passing thought of a frightened lad, whose head was teeming with the wild notions of romance. But when next the idea occurs, it assumes altogether a different and more determinate aspect.

Before daybreak the boys are captured, and each imprisoned in a separate cell, but not before Jean Marc, irritated by a remark, had struck the master of the school over the face. This, of course, places him beyond the bounds of mercy, and for ten days he is kept in solitary confinement. With a refinement of cruelty he is suffered to appeal again and again by letter to an aged aunt, beseeching her to remove him from the school, but these letters are never forwarded to their destination. Ill from his confinement, and despairing at this seeming utter desertion, he gives himself up to thoughts of suicide, and contrives to secure the means for effecting the act, if driven to extremity. At length his aunt appears upon the scene, and he is transferred to another college, where he finds masters who at least have the merit of being polished, where every care is bestowed upon the pupils, and where there is a species of family tuition. But the mental

mischief which had been done was too deep to be eradicated, although its effects were somewhat modified by the happiness of his present lot.

"It was while in confinement," he writes, "at war with the brutalities of a stupid and ignorant master, attended by domestics that a recruiting sergeant would not have enlisted, and who ridiculed me, that I first understood that my nature was too haughty, sensitive, and unsociable, in consequence of an exaggerated delicacy, and was not fitted to shoulder humanity with impunity. I utterly disdained all who surrounded me. Society seemed to have united its forces to crush an infant, and, as Jean Jacques, I was ready to cry—*Carnifex! carnifex!* I hated equally every one in the school, which for me was the universe. I hated the master who kept me in this absurd prison; the attendant who had charge of me; and my comrades, who had not attempted to release me, but had cried—*Væ victis!* Be it so: I will heed them no more; I detest the former; I scorn the latter. I will go on my way alone, pressing forwards in loneliness and pride. During the ten days I was confined, my brain received the germs of many thoughts, which have since been matured, branching throughout the mind like thorny brambles. I imbibed then an aversion to brute force which has never quitted me; and I abominate the useless power of *athletæ*, of rich men, and soldiers."

He is now seventeen, and he yields himself up to vague dreams of glory, of pleasure, love, and poetry. He idolizes *Antony* "who has spitten in the face of society," and *René*, the sceptical Christian, the visionary, and the poet, and already he had learned from the pages of Gibbon to admire Mahomet. In this fashion he panders to his worse traits. Presently he becomes his own master, and at once plunges into the vortex of a so-called life of pleasure.

"I was attracted towards everything by an immoderate curiosity: I sought to learn, and I learnt at my own cost. I lived prodigally and without bounds, holding back at nothing. I was at length free, and realized the dream of my life, and like those who, after a long fast, gorge themselves imprudently with food, I devoured, even to death. Horses, hunting, women, nocturnal orgies, the theatre, Paris insensate, follies of every kind, extravagances of every sort, absurdities of every species, and the foolish satisfaction of a stupid self-conceit. One day, at sunrise, I crossed swords with an adversary; I felt the cold iron penetrate my arm and tear my chest, whilst he fell, uttering a great cry. 'Two true men nearly killed for a girl,' sneeringly remarked a bystander.

"Scarcely well, and proud perhaps of carrying my arm in a sling, I recommenced my shameless life. The Bois de Boulogne saw me every day, the coulisses every evening, the Cydalises every night. *I marched rapidly towards the gulf, not of ruin, which is nothing, but of brutishness, which is much worse.* Lastly, ennui came, ennui profound, implacable, infinite. I apprehended, from the disgust which seized me,

the foolishness of which I had been guilty. I withdrew quickly from this absurd, mad, and wicked life, in which I had wallowed nearly a year; an existence impious and abominable, *which lays hold of a man, and transforms him into a cretin*,* as the sea which swallows a living body and casts up a corpse."

He next flies to a distant mountain village, and seeks there to repair the evil effects, physical and mental, which his excesses have induced. Recalled to Paris, on arriving at his majority, he is bewildered by business matters, his regrets for the past, his cares for the future, his physical sufferings, his indecision upon the choice of a career, and his isolation.

"The study of law, to which it was sought to lead me [he writes], frightened me by its dryness, its prosaic nature, and frigidity. My spirit, naturally contemplative, was inclined towards artistic matters; but, from a sentiment of false dignity, I refused to fix myself to any course assiduously, and I obstinately and angrily persisted in doing nothing. I lived in an idleness one hundred times more dangerous than the most dangerous work.

"I was too much ashamed of my first outset in life ever to fall back again into the bottomless abyss of debauchery and folly. Some occupation was, however, needful for me, and unhappily I found it in myself. It was determined by my pitiful organization. It was the consequence, perhaps inevitable, of those tedious maladies which had assailed my childhood, and of the sufferings which they had bequeathed me. I became—the word is so pretentious I hesitate to write it—a dreamer. Daily stretched on a couch, motionless and with drooping hands, the eye lost in strange contemplations, I fell into boundless reveries, on being aroused from which all reality pained me. I lapsed into another and more attractive life, attaching my thoughts to everything which occurred, and converting all into aliment for the insatiable demon which inhabited me. Pleasant days passed away thus.

"Sometimes I bordered upon ecstasy, but sometimes also I suffered considerably. When my spirit, which, as holy men say, could not see the things which were beautiful, followed the ways of sadness that its perilous inertia had opened to it, I suffered intolerable pains. Unceasingly enticed by these singular attractions towards the chagrin which disturbs enfeebled and nervous natures, I loved the ill which devoured me; I sought for and provoked it, abandoning myself to it without measure; I experienced the invincible attraction of suffering; my pride was gratified by it, and I hunted my soul violently in the sombre depths of imaginary torments.

"My desires, even the most legitimate, fell into an ever-agitated river, and were cast up again upon its banks dead or dying; and I relished these dangerous joys, not doubting that I was yielding up my being to a pitiless vampire.

"Naturally reserving to myself the best part among the personages with which I peopled this ideal life that I had created, I quickly

* The Italics in this quotation are our own.

became disgusted with the banal outer life, which clashed with my instincts, or, at least, with my susceptibilities. I separated myself then from all society, and lived nearly alone, seeing but a few of my friends who were indulgent towards me.

"I felt presently the danger of this passion of mine, a hundred times more formidable than drunkenness, because it is a perpetual intoxication. I had developed certain of my intellectual faculties, but I had neglected others, and I had cultivated my sensibility to so great a pitch that everything irritated and pained me. I sought to end this malady at a single blow, before it became mortal, and so I resolved to take a long voyage."

Starting from home, he seeks distraction in the East, but in vain. He had departed unsociable, he returned more so; he had gone away suffering, he returned incurable. He now seeks refuge in suicide by poison; but too eager to attain his end, he overdoses himself, the stomach rejects the deadly agent, and he escapes.

What follows of our hero's life are chiefly incidents of pellicacy* and adultery, decked up with a wealth of meretricious and *quasi-virtuous* sentiment. With these details we have nothing to do, further than barely mentioning them. We pass on to show the character of the pseudo-philosophy which pervades the book, and by which all distinction between virtue and vice is done away with, and the former term rendered an unmeaning one.

Jean Marc, it must here be remarked, does not so much philosophize himself as adopt the philosophy of others to practical and every-day uses. He has a friend named Sylvius, to whom he is accustomed to defer in matters of recondite thought. This friend is mortally wounded in a duel, arising out of a squabble in the lobby of the Opera, and on his death-bed he takes occasion to recount his Belief, and in so doing sums up the philosophy of the book. The whole scene in which this occurs is singularly curious as a piece of contemporary writing, as a psychological study, and as an expression of opinions, which seem largely to pervade much of the popular French literature current in England. We shall describe it, therefore, somewhat fully. At a time when fears have been aroused that not merely the doctrines of the Church of England, but the primary tenets of Christianity are being tampered with, by certain publications foreshadowing a school of extreme idealogical theology, it cannot be useless, apart from any other considerations, to note what an extravagant and fantastic ideology has wrought among a highly cultivated class intellectually (a small class it may be, but an influential one, nevertheless) across the Straits. In their concentrated form, the doctrines put into the mouth of Sylvius might seem to the English reader to partake of the character of an absurd, although clever carica-

* Pellex (Παλλακίς, *concubina*).

ture. But when it is considered how aptly these doctrines when diluted with sentiment, and spiced with garbled Scripture texts, appeal to the passions without unduly exciting the prejudices of the young, it will be conceded, we think, that their absurdity is no more an obstacle to their being largely received, than the absurdity of the most glaring system of quackery is an obstacle to its being largely indulged.

Sylvius is wounded fatally. A priest (summoned by an over-officious servant), the doctor, Jean Marc, and Bekir Aga, his Arab servant, stand near the bedside of the dying man. "My son," said the priest, "doest thou wish to be alone with me that thou mayest confess thy sins, in the name of the Father, the Son, and the Holy Ghost?" "No," replied Sylvius; "what I have got to say all the world may hear." "Believest thou in the Catholic, Apostolic, and Roman religion?" rejoined the priest. "It was the religion in which I received baptism, and in which I was brought up," answered Sylvius; and then, rejecting the prayers of the Church, he exclaimed, "I believe in God, the Father and Creator Omnipotent; I believe in the life eternal; but I do not believe Jesus Christ to be the *only* Son of God." "My child," cried the astonished priest, "believest thou not in the divinity of our Lord Jesus Christ?" "I believe," replied Sylvius, "in Jesus Christ as an Apostle, Prophet, and Word of God, but not as the only Son of God." Whereupon Bekir Aga who had been listening attentively to this conversation, interposes, crying out, "Thou art right! thou art right, friend of my master! Has not the prophet (Mahomet to wit) said, 'BlaspHEME not God in saying that he has children.' " And then, after reciting sundry dogmas of his faith, Bekir Aga briefly describes the sensual delights of the paradise promised to all true believers, and adds: "God is generous, His mercy is infinite, and thou mayest enjoy all the felicity that He has promised to the sons of Islam, if thou wilt say with me, from the bottom of thy heart: 'There is no god but God, and Mahomet is His Prophet!'"

The priest drew back indignantly, but Sylvius, smiling, said: "O Bekir Aga! I can say with thee 'There is no god but God, and Mahomet is His Prophet;' but I add that there have been and will be many other prophets of God." "What! do you admit the fatalist doctrines of this miscreant?" passionately exclaimed the priest. "Does not your reason revolt against the lying fatalism which is the foundation of Islamism?" Bekir Aga, quickly interfering, responded, "Deniest thou the omnipotence of God, in believing that any fact, however insignificant it may be, can occur without his express permission?"

Sylvius, turning towards Jean Marc, here playfully remarked, "Seest thou not that I resemble Robert the Devil, when, in the

fifth act, he is pulled about by Alice and Bertram." Then raising himself painfully the dying duellist speaks, and the scene proceeds as follows :—

" 'I believe [said Sylvius] in my freewill, force interior and personal, which enables me to direct my thoughts and my actions ; I believe in fatality, force exterior and foreign, which weighs upon my thoughts and my actions, dragging them out of the path that I have freely chosen : I believe in the necessary and indispensable existence of the one and the other, because, between the two, at a variable distance, is stretched a line, that of Providence, which it is necessary to follow, and which comes naturally to us. This is a mechanical theorem which can be demonstrated by the parallelogram of forces. If I obey solely the *objective* (fatality), or solely the *subjective* (freewill), I withdraw from the truth, the wisdom, the virtue, the reward, which form the immovable, intermediate line in the Lord's will. My freewill can constrain and vanquish fatality ; it can, in certain moments of passion and of ecstasy, constrain even God to draw it to himself. I believe, then, in freewill, in fatality, and in Providence.'*

"The priest and Bekir Aga looked at each other with eyes of which the astonished expression proved that they had not comprehended the meaning of the words uttered by the dying man. Nevertheless the priest, desirous to discover the yielding side of this spirit so rebellious to his efforts, said with emphasis : 'thou, at least, believest in the immortality of the soul ?' 'No,' answered Sylvius, 'I believe in its eternity !' 'This unhappy man,' said the poor priest, turning towards us, 'has been poisoned by the subversive doctrines which have already done so much evil in our epoch.' 'It is permitted to all to seek the truth,' I responded. 'You are impious,' he murmured.

"A strange animation brightened the visage of Sylvius: he moved his lips as if he recited some prayer. All were so silent that the ticking of the timepiece was heard. 'Raise me,' he said ; 'I would again speak.' We surrounded him, tossed up the flattened pillows, and the doctor and myself supported him upon our crossed arms. He re-

* It may be said of M. Sylvius as of Hudibras—

"He could reduce all things to acts,
And knew their nature by abstracts ;

And in the sequel it will be seen that he knew—

Where entity and quiddity,
The ghosts of defunct bodies fly ;
Where Truth in person does appear,
Like words congeal'd in northern air.

Like Ralpho, M. Sylvius is also—

"Deep-sighted in intelligences,
Ideas, atoms, influences ;
And much of terra incognita,
Th' intelligible world would say."

Abstract metaphysical terms, such as *subjective* and *objective*, *Ego* and *non-Ego*, *monad*, and so forth, become under his manipulation distinct entities.

mained a few moments immovable, as if absorbed in thought, and then said:—

“No! I am not impious, because I believe in thee, O my God! Source of all virtue, of all truth, of all intelligence, of all justice, and of all mercy; I believe in thee! Thou art in us as we are in thee, all are in thee as thou art in us. O compassionate Father! thou art the life eternal which circulates in all creation, and even in those subtle perfumes which are perhaps odoriferous animalcules. It is thy meditation among the things of nature which makes them so beautiful; it is thee, always thee, that we search for, that we love in the landscape, woman, the stars and the blue sky; it is that we may incline to thee, that we may draw nigh to thee, that we may better comprehend the mysteries of thy infinite space, that increasingly we strive to augment our intelligence and our mind. O, my God! I believe in thee. Thou art the Idea,—power indestructible, invincible, persistent, unchangeable, always increasing, expanding, and strengthening, mother of faith, of hope, of charity, and of restoration, agent mysterious who speaks in the conscience of each, and who embraces the heart of all; fluid impalpable, which nothing can render motionless, which advances slowly but inexorably towards its end, and which draws everything to its aid, even its enemies—obstacles and persecutions; thou art the Idea,—fertilizing river which streams into humanity, and which penetrates it as water penetrates a sponge! Thou art Love,—attraction irresistible, which makes tremulous the molecules of thy essence diffused throughout the great whole, and which successively draws one towards another, in order that the two portions of thy power may reunite momentarily in a union full of ecstasy. This ecstasy materialists have termed intoxication of the senses, and it is, perhaps, the beatitude of thy vibration revealed in us! O, my God! I believe in thee.

“I believe in thee, who knows all things by thy sovereign memory and sovereign prescience; I believe in thee, author of progress, in thee who brings forth the best effects from the worst causes; I believe in thee, who with thy divine finger points out to us the future, and who destroys not the past that it may serve to ameliorate the future, because thou art the Law, Father of justice! and thy power is never retroactive; I believe in thee, thou art the soul in which we live, thou art the soul who lives in us; I believe in thee, I believe in thee!

“I believe in my soul,—emanation essential of God, integrant part of him, and divine as he is divine; I believe in my soul, immaterial and progressive in its nature, intelligent in its operations, eternal in its destiny!

“I believe in my soul,—endowed with ubiquity, since it exists easily in many places at one time; in the hearts of my friends, in the soul of my mistress, in the remembrance of those who are afar off, in the animals which serve me, in the landscapes I love, in the oceans I have traversed, in the stars that I look upon, in the deserts where I have slept, in the dead who have gone before me!

“I believe in my soul,—aggregation of divers monads, legion composed of different essences derived from the other souls that I have

met with, loved or hated, vanquished or aided, lost or saved in my previous existence! These portions of the soul are each in themselves as a soul; these are the depositaries of the reminiscences of my former lives, and are the source of my anticipations, my sympathies, and my innate ideas; these, by turns, according as they are stirred up, look out by my eyes, and give them their variable expressions of wickedness, softness, anger, charity, courage, fear, goodness, and tenderness. They are united in one as a sort of deliberating assembly, which discusses, judges, directs, condemns, approves, corrects, restrains, excites, excuses my thoughts and my actions. Each gives its reasons for or against, and the result is determined by the plurality of voices, except when an unforeseen and grave circumstance suddenly gives rise to an unanimous decision, induced by the irresistible eloquence of one of the interested monads. Then, as good men say, I yield to my first impulse. It is this aggregate which, always increasing in intelligence and number, constitutes my eternal soul.

"My soul is eternal; it always has existed and always will exist.

"It has lived already under a palpable form, and it will live again; it will advance, climbing the ascensional scale of intellectual aggrandizement; when it becomes the most elevated monad of this planet, it will foresee the near coming of new times, it will hasten the march of humanity illuminated by its rays, and will carry it away in its train towards the superior monads, to which we shall journey all together, to enjoy more perfect and more numerous senses, a greater multiplicity of and more vivid sensations, a loftier reason, and more extended comprehension; it will guide its sister monads, divested of their prevaricating instincts, towards the essence even of God, who is justice, intelligence, truth, and love supreme.

"Happiness in this life is an insignificant thing with God; intelligence alone, and the virtues which arise from it, are of any worth in His eyes. The more intelligent a man is, the nearer he is to the Lord, the nearer to Beatitude.* What signifies unhappiness and misery? Are they not the fires which purify the metal? Intelligence, the gift direct of God, is the recompence of work accomplished in preceding existences; it alone agrees in following the Providential line; other guerdons are often on the route of freewill and fatality; happy he who has both the one and the other in his portion. It is said of poets and apostles that they are above humanity: this is true. The divine path in which they pacifically advance predominates greatly above all the mortal interests of the *Ego* and *non-Ego*.

"I believe in the persistence of the *Ego*,—force latent of which I am assured, and which sometimes surges up in all its clearness; conscience inactive, but always living, and which is aroused on the day when

* *Parson*.—"Intellectual power, refined to the utmost, and wholly void of beneficence, resembles only one being, and that, sir, is the Principle of Evil."

Randal (startled).—"Do you mean the Devil?"

Parson.—"Yes, sir—the Devil; and even he, sir, did not succeed! Even he, sir, is what your great men would call a most decided failure."—*My Novel*, b. ix. c. viii.

death renders itself mistress of the body. I shall die ; I am about to die ; that is to say, I am about to undergo a new transformation. Then my soul, divested of this fleshy covering which imprisons it, and which it now wishes to cast aside, my soul once more enters fully into the exercise of its *Ego*, comprehending fully all the progress that it has already made, perceiving that which it has still to make, rendering to itself account of effects and causes, and imprisoning itself joyously in another body, in order to continue the work for which God has chosen it.*

"I believe in the Providential mission of self-denying men, apostles, and prophets, who have raised the human spirit by teaching higher morals, and who have scattered among their fellow-mortals seeds, the fruits of which generations yet to come will harvest. I believe in these men,—in Zoroaster, Menu, Abraham, Moses, Confucius, Socrates, Jesus Christ, Manes, Mahomet, Luther, and many others. I believe in those whom I have seen in our own days, gentle, benevolent, peace-makers, reinstating the flesh and fertilizing the spirit, and who have been loaded with outrages and become martyrs as the Son of Man. I disbelieve entirely those senseless bugbears of eternal pains, of flaming hells, of horned devils, and of Satans cursed for ever, a laughable phantasmagoria made use of by the wicked to terrify the people. I believe in a God of indulgence and of mercy ; the God of vengeance is dead and will revive no more ; the times of wrathful and terrible divinities are gone by ; un pitying heavens have passed away for ever ; Jehovah Sabaoth is now without hosts, and the blood of his Son no longer suffices to quench the thirst of panting humanity.

"I would say the *prayer* which Jesus taught his disciples on the dusty roads of Palestine—the prayer of those who love, of those who believe, of those who suffer, of those who hope."

And so, repeating the Lord's Prayer, Sylvius ends his confession of faith.

The author of the essay in the *Connoisseur* (No. 74), on the Modesty of the Moderns, in including all the Vices instead of Virtues in the character of a fine gentleman, suggested the writing of a new treatise on Ethics, or a System of Immoral Philosophy. It would seem, judging from the creed of the dying duellist, as if M. Maxime du Camp aimed at being the promulgator of such a system. In an early number of the *Connoisseur*, moreover (No. 9), in an essay upon the impetus given to "free-thinking" by the publication of Lord Bolingbroke's works, is to be found, also in the form of a creed, a satirical summary of the tenets of the religious sceptics of that day. In this creed the free-thinker is

* Cyrano-Bergerac, in his vision of Hell, states that he found Pythagoras, much to his discontent, associated with the comedians. It is marvellous to conceive how modern advocates of the doctrines of metempsychosis can overlook the essential nature of this connexion. See the *World*, No. 163 ; the *Doctor*, chap. 127 ; and Dr. Pusey's edition of *St. Augustine's Confessions*, Appendix, Note iii. a.

represented as avowing his belief in the first philosophy, but not in Moses; in Mandeville, Hobbes, Shaftesbury, and others of the same category, but not in the Evangelists; in Bolingbroke, but not St. Paul; in tradition, but not Revelation; in the Talmud and Koran, but not the Bible; in Socrates, Confucius, Sanconiathon, and Mahomet, but not in Christ. Finally, he asserts his belief in all unbelief.

A comparison of this creed with that of the dying duellist (fitting apostle of the faith he professes!) brings into clear light the special peculiarity of the Werther school of moral philosophers. While adopting all the essential tenets of the former creed, with a refined, Mephistophelian ingenuity, it dresses them in a quasi-Christian phraseology, and includes among them certain theistical notions. The result is certainly a most incongruous one, and the idea of Deity a complete negation. In truth, the pseudo-philosophical doctrines of Sylvius constitute an "eclectico-pantheistical farrago," which, in reality, is the rankest atheism, clad in an ill-fitting guise of spurious Christian æstheticism.* "The whole mind of the world," says Cousin, "is not able to vindicate pantheism. One attempts it in vain. If he be consistent, he ends with it only at a species of soul of the world, as the principle of things; at fatality as the only law, at the confusion of good and evil—that is, at their destruction, in the bosom of a vague and abstract unity, without a fixed subject."† "What is pantheism?" writes Pascal. "It is not an atheism disguised, as they say: no; it is an avowed atheism. To say, in presence of this universe, so vast, so beautiful, so magnificent: God is there entire, behold God, there is no other; is to say as clearly as possible that there is no God, for it is to say that the universe has not a cause essentially different from its effects. . . . However immense it may be, this world is finite in itself; compared to God who is infinite; he manifests, but he also veils his grandeur, intelligence, and wisdom. The universe is the image of God, it is not God; something of the cause passes into the effect, it does not exhaust itself there, and it remains entire. The universe is so far from exhausting God, that many of the attributes of God are there covered with an obscurity almost impenetrable, and are discovered only in the soul of man. The universe is a necessity; but the soul is free, it is one, simple, essentially identical with itself, under the harmonious diversity of its faculties: it is capable

* "Who," asks St. Augustine, after attacking the Manichæan theory—"who would not execrate these things? Who would not understand them to be injurious and abominable? But they, when they catch men, do not utter these things at first, for so should they be laughed at, or avoided by all; but they choose passages out of Scripture, which simple men do not understand, and thereby deceive unskilful souls."—*De Agon. Christian.* c. 4.

† *Cours de la Philos. Mod.*, Lect. V. p. 3.

of conceiving virtue, and of accomplishing it; it is capable of love and of sacrifice. Now, we are averse to believing that the being who is the first and last cause of the soul is an abstract being, possessing less than he has given, and having neither personality, nor liberty, nor intelligence, nor justice, nor love. Either God is inferior to man, or he possesses at least all that is permanent and substantial in man, with infinity besides."*

In what manner the pseudo-philosophical doctrines, of which Sylvius is the mouthpiece, and Jean Marc the devoted disciple, are adapted to every-day uses, we have now to learn. This portion of our task must, from its nature, be effected with brevity. And, first, of the mode in which the problem of happiness is solved.

Sylvius, in a letter to Jean Marc, tells us that every one has an indefinite sentiment of inquietude which urges him at all times to seek novelty. This sentiment he calls the "right to happiness." We all possess this right, we know it instinctively, and, consequently, we seek to be happy. If we seek for happiness in ourselves, we shall not find it; if we seek for it in others, we shall be also unsuccessful. It is to be found only in what he calls the "line of Providence," which lies equidistant (as explained in his creed) from the *ego* and *non-ego*. In fact, it is to be found in Love, which is an exchange between our own forces and those of others. Equal communion of the *objective* and *subjective* is requisite, we are told, to make us happy. In the search after happiness, however, we often deceive ourselves; hence it is that women become mobile, men unfaithful. From this point of view, we are not surprised to learn that the legendary history of Don Juan is a symbol—that it is, in fact, a sacred tradition, of his school of morals. "He marched on," writes Sylvius, "from amour to amour to the conquest of an ideal, which he foresaw. Many brave men, of the number of those to whom Rabelais has dedicated his works, have seen in this ideal solely a coveted mistress. He sought happiness where, in reality, he ought to have manifested it, in love; he did not find it, and he again went in quest of it. Rest assured, that he has since found it in the world he now inhabits. I believe that in the rewards of the future, love will be recompensed as a virtue. God is a part of ourselves, and he is not forgetful, believe me, of the happiness that we have given in rendering ourselves happy. True felicity lies in this path. The Master has said, "Love ye one another." But it has been said in the creed, that happiness in this life is insignificant with God compared with intelligence. How, then, consistently (not that consistence is at all needful) represent God as mindful of

* *Des Pensées de Pascal*, avant-propos.

our happiness in love, and love as happiness? Love, we must now learn, is the mainspring of intelligence. It is the "armour and armature of man."

"March onwards," writes Sylvius in the same letter, after remonstrating with Jean Marc for feeling grief and an increased hopelessness at the loss of a mistress, and instructing him that it was only by successive and repeated trials that he could hope to attain to a true knowledge of love—"march onwards towards the new hope, towards the increase of all thy faculties—that is to say, towards love. Learn how to love, and give thyself to it without measure; thy heart will beat more easily, thy breast expand more fully, and thy brightened intelligence will blaze upon the forehead like a star."

We need not do more than note briefly without polluting our pages with details, how by a logical sequence pellicacy becomes the chief social development, the "mistress" the high priestess of this *cultus*: how prostitution has a scintillation of divinity about it (—"The Saint-Simonians* are right," exclaims Jean Marc, apropos of this subject, "the name of God is written upon every wound.... Let us love, and leave the rest to God."—), and how even adultery must be added to the list of virtues:—"Above the narrow and abusive right of a husband (it is Jean Marc who again speaks,) there is a right, human, emotional, imprescriptible; and this right I use, without scruple, with the profound conviction of remaining an honest man."

It is an unpleasant reflection that the two most popular works in the French tongue inculcating these doctrines, *The Lady with the Camelias*, by A. Dumas the younger, and *Fanny*, by L. Feydeau, brilliantly written stories, have been recently translated into English, and are now widely circulated in this country. Upon the first work was founded the opera of *La Traviata*, and the story (which is simply the apotheosis of a common prostitute) is pretty accurately epitomized in the libretto. The production of *La Traviata* in London, and the avidity with which it was (and is, indeed, still) received on all hands, gave birth to a widespread desire for, and led to the publication of, the original story; and this, again, has led to the translation of the even still more detestable and abominable work of M. Feydeau. Truly Mephistopheles must have once more occupied the prompter's box.

Divested of all periphrasis, the character of Jean Marc is such as St. Augustine so exquisitely described his own character to

* "Pantheism is, properly, the deification of everything, the great whole regarded as God, the universe-God of the most part of my adversaries, of St. Simon, for example. It is at the bottom a veritable atheism, with which one can mix, as St. Simon has done, at least his school, a certain religious colouring."—*Cousin, Op. cit. Lect. V. n. 3.*

have been when young. "Out of the muddy concupiscence of the flesh," he writes in his *Confessions*, "and the bubblings of youth, mists fumed up which beclouded and overcast my heart, that I could not discern the clear brightness of love from the fog of lustfulness. Both did confusedly boil in me, and hurried my unstayed youth over the precipice of unholy desires, and sunk me in a gulf of flagitiousness. Thy wrath had gathered over me, and I knew it not. I was grown deaf by the clanking of the chain of my mortality, the punishment of the pride of my soul, and I strayed further from Thee, and Thou lettest me alone, and I was tossed about, and wasted, and dissipated, and I boiled over in my fornications, and Thou heldest Thy peace, O Thou my tardy joy! Thou then heldest Thy peace, and I wandered further and further from Thee, into *more and more fruitless seed plots of sorrows, and a proud dejectedness and a restless weariness.*"*

But with none to attemper his disorder and turn to account these, the extreme points of God's creation,—none to "put a bound to their pleasurable-ness, that so the tides of youth might have cast themselves upon the marriage shore, if they could not be calmed and kept within the object of a family as Thy law prescribes;" and condemned to that penal blindness which God dispenses to lawless desires,† Jean Marc (as Werther) passes from dejectedness to despair, from weariness to disgust of life. And so to suicide, the natural consequence of a life that in its maturity had attained no higher conception of happiness than mere habit, of the duties of manhood than a barren sentimentalism, of Deity than an utter negation, of virtue than an expedient vice, of law than a conventional virtue.

"The suicide," Aristotle wrote, "does not undergo death because it is honourable, but in order to avoid evil;"‡ and Plato has represented Socrates as saying, addressing Simmias, "Do you know that all others (except philosophers) consider death among the great evils?" "They do, indeed," Simmias replied. "Then do the brave amongst them endure death when they do endure it through dread of greater evils?" "It is so. All, therefore, except philosophers, are brave through being afraid and fear; though it is absurd that any should be brave through fear and cowardice."§ The suicide, in fact, believes death to be an evil of less magnitude than the ill from which he seeks to escape. This

* *Confessions*, Bk. ii. c. 2.

† "How deep are Thy ways, O God, Thou only great, that sittest silent on high, and by an universal law dispensing penal blindness to lawless desires."—*Confessions*, b. i. c. 18.

‡ *Ethics*, b. iii. c. 7.

§ *Phædo*.

is the great principle which governs the commission of self-murder. No influence, therefore, can be conceived more powerful to hold in check the self-infliction of death, than such as indelibly fixes upon the act the character of an evil far surpassing in gravity any, even the sharpest or bitterest ill, to which man may be subjected. Hence the Christian Church, in branding suicide as an inexcusable offence against God, and Christian Legislatures in attaching to it the stigma of an irreparable and disgraceful crime towards man, stamp the act as an evil, morally and socially, to which all others which might prove influential in promoting self-murder are, in comparison, petty and insignificant.

But the first of these motives is entirely, the latter comparatively powerless in restraining disciples of the Werther school of philosophy, of which Jean Marc is the latest example. For, when the idea of Deity is a negation, that of sin also is a negation; and when the conception of crime is not vitalized by that of sin, crime becomes a mere question of expediency. If, then, suicide be regarded solely in this light, the animal love of life, the physical fear of death, and conventional notions of disgrace, will alone interpose to check the tendency to self-murder.

Jean Marc is dead by his own act, and for his epitaph is written:—" *Ici git la dépouille d'une Ame Eternelle.—O Mort, que j'ai forcée a m'obeir, déjà je t'ai vue souvent dans mes existences antérieures, et souvent je te reverrai dans mes existences futures. Choisis-moi de préférence lorsque tu voudras délivrer un Homme de l'enveloppe qui embarrasse son ame éternelle; fais que je sois ton élu à toujours, et conduis moi de Transmigrations en Transmigrations jusqu'à Dieu, afin que je puisse rentrer à jamais dans son Essence Infinie et Eternelle! Ainsi soit-il!"*

This is the ideal of suicide.

"*Regardez un peu,*" said the landlady; "*Messieurs, il m'a gaté trois matelas, et il me doit quarante quatre francs.*"*

This is the real.

ART. IV.—FEMALE PHYSICIANS.

WHY should woman be excluded from the legitimate practice of Physic? why should she be debarred from wielding pill and potion?—that is to say, according to the rules of art, for it is a painful fact that she is not excluded, neither does she exclude

* Thackerah's *Paris Sketch-Book*:—*The Gambler's Death*.

herself from wielding them according to her own good will and pleasure. Who among the affectionate cares of nurse or mother, by which his childhood was fenced in, has not to enumerate the periodical administration of some nauseous domestic remedy? Young Hopeful is accustomed to awake with the lark, and he has acquired a happy faculty of arousing the whole house soon after he is astir. "My dear," testily exclaims the disturbed father to his equally disturbed (but not testy) wife, "I wish you would teach nurse to keep Johnny quieter until breakfast time." But this morning the mother sleeps long beyond the accustomed time of being aroused, and suddenly awaking she hears no noise but the melodious breathing of her spouse, slumbering quietly by her side, and the subdued sounds made by the housemaids in the lower parts of the house. Startled by this boding absence of the usual racket, she hastily puts on her dressing-gown, and hurries to the nursery. There she finds young Hopeful in bed, not asleep, but by no means vivacious. "What ails my dear boy?" cries the anxious mother, taking him in her arms. "Is he poorly?" Johnny responds to his mother's embrace by a half sulky caress, and the nurse interfering, proceeds to explain that he has had a somewhat restless night (meaning that he awoke once before his usual time), and that she thinks he is a little feverish. Then mother and nurse, putting their heads together, and having in mind certain indulgences in the shape of sweetmeats which young Hopeful had been permitted to revel in the day previous, come to the conclusion that it would be prudent to give him, by way of corrective, a little of that time-honoured combination and chiefest of all domestic remedies—Senna and Salts. The nauseous draught is ready, and nurse taking Johnny on her knee, advances it to his mouth; but no sooner does the odour reach his nostrils, than he starts back with a loud cry. Nurse and mother in vain endeavour to persuade the child to swallow the sickly stuff. Tossing about, kicking, and shrieking, he sets the best intentioned efforts at defiance. Sixpences and shillings tempt not, sweetmeats he repudiates with scorn, and promises of marvellous toys fall unheeded upon his ears. The nurse begins to be vexed and imperative, and the mother looks distressed. The draught must be taken. The necessity is awful, but absolute. Both nurse and mother recognise the terrible struggle now involved in the administration. The nurse would, however, terminate the contention at once by main force, but the mother still hopes to succeed by gentler means. "Johnny, you *must* take the physic," exclaims the nurse, with a significant shake of the child. "I wont," shrieks Johnny. "Don't hurt him, nurse," cries the mother, the tears forming in her eyes. "Johnny dear, wont you take it to please Ma?" "No-o-o!" blubbers Johnny.

"You naughty boy," says nurse. "I must send for your father," cries the mother. And in the end the father is called from his dressing-room, having been duly impressed with the gravity of the occasion. With a big voice, but a faint heart, he confronts the recalcitrant child, cup in hand. "Johnny, you will take this from me." "No," retorts Johnny, with a kick and a sob. "Then I shall whip you, Johnny;" but the threat makes no impression. "What must be done?" then asks the nonplussed father, now utterly helpless. "Make him take it," answers the nurse, in a peremptory tone; "what's the use of trifling with him in this way?" A housemaid is called up to aid. The nurse throws Johnny on his back over her knees, he screaming loudly. The housemaid holds him tightly by the arms and shoulders, the mother secures the legs, the father steadies the body. Then the nurse, seizing the nose of the child between the thumb and finger of the left hand, compresses his nostrils until he opens his mouth widely, whereupon she pours into it the abominable draught. Part is swallowed, but the greater part is sputtered out, bespattering the housemaid's neat print dress, and the nurse's face. The nurse is put out of temper for the day on account of the naughtiness of the child; the mother is vexed that he has had to be dealt with so severely; the housemaid is annoyed because her clean dress is spoiled; the father is tetchy because his matutinal bloater happening to be ready for him before he was ready for it, has become lukewarm; and the cook is indignant, because he was cross with her needlessly. And all this turmoil in the internal economy of the house is but a faint reflex of the turmoil in the unfortunate Johnny's internal economy.

In our own boyish days senna and Epsom salts, and treacle and brimstone (horrific compound!) formed part of the "institutions" of childhood. No household would have been considered well ordered which did not contain among its permanent stores the drugs we have mentioned, together with rhubarb, magnesia, and sundry "simples;" no housewife would have been regarded as at all equal to her duties who was not versed in "Buchan," and prepared at any moment to dose any of her household upon the slightest occasion.* The passion for physicking among housewives is not a whit less marked now than then. In certain districts

* "Old Gervase Markham, in his 'Approved Book called the English Housewife, containing the inward and outward virtues which ought to be in a complete woman,' places her skill in physic as one of the most principal. 'You shall understand,' he says, 'that sith the preservation and care of the family touching their health and soundness of body consisteth most in her diligence, it is meet that she have a physical kind of knowledge, how to administer any wholesome receipts or medicines for the good of their healths, as well to prevent the first occasion of sickness, as to take away the effects and evil of the same, when it hath made seizure upon the body.' And, 'as it must be confessed that the depths and secrets of this more excellent art of physic are far beyond

it may have assumed a more refined and less aggressive character, but its vitality is not on that account diminished. The much-revered "Buchan" has been supplanted by a host of other (and better) works, simplifying medicine to the capacity of the domestic mind. The cleverest thing that homœopathy ever did in a worldly-minded point of view, was to pander to the disposition existing among ladies for domestic physic. What chance had the sickly senna, the bulky magnesia, the nauseous salts and the gritty rhubarb against the elegant *materia medica*, complete in itself, packed within the compass of a lady's reticule, and of which the drugs were tasteless, odourless, and not offensive to the sight? But idealism in physic seldom holds extensive sway long. However much people may abhor drugs in their unsophisticated state, they quickly lose faith in them when they are so disguised as to be deprived of all sensible qualities. Among the uneducated in many parts of the country it is an article of belief that the beneficial effects of a drug are in proportion to its nastiness of taste. "I reckon nought of physic that's gotten no taste in 't," we heard one of the illiterate say not long ago. The word "physic," in fact, has come to have a specific secondary signification attached to it, implying nauseousness of taste or smell, as when we say a thing is "physicky." This highly sensualistic view has a much wider and more extended influence over people than might be at first imagined, and it has exercised an important influence in checking and controlling, and ultimately subduing the rage which at one time prevailed for homœopathic domestic medicine. The refined charlatanry was no match against the rough common sense which is happily tolerably plentiful among us; and it only found a lodgment among those who cared to exercise their imagination rather than their ratiocinative powers, and who were too highly educated to pay heed to the very vulgar dictates of ordinary reason.

The doctor is often sadly pestered by the passion for giving physic among ladies. No sooner has he thrown light upon the nature of the case he has been called to, than some work on domestic medicine is consulted by the lady or ladies of the house, and, unless he has great tact in putting an immediate end to the nuisance, he is apt to be sadly troubled with suggestions or questions as to why he did not do this, that, or the other thing. Frequently the

the capacity of the most skilful woman,' he relates for the housewife's use some 'approved medicines and old doctrines gathered together by two excellent and famous physicians, and in a manuscript given to a great worthy Countess of this land.' And the author of '*the English Gentleman and the English Gentlewoman*,' presented to present times for ornaments, and commended to posterity for precedents, says of the gentlewoman, 'herbals she peruseth, which she seconds with conference; and by degrees so improves her knowledge, as her cautious care profits many a dangerous cure.'—See Southey's *Doctor*, pp. 57, 59.

annoyance takes another form. "Doctor, Mrs. So-and-so tells me that when her child was suffering in this manner, Doctor So-and-so ordered so-and-so. Would it be proper to do the same in this case?" Not long ago a distinguished member of the Medical Council was giving most careful instructions to the nurse in an exceedingly grave case, when one of the ladies of the family who was present, interfered and suggested the addition of a domestic diet-drink of local celebrity to the general treatment of the case. "Madam," was the sharp and vexed retort of the doctor, "if you wish to take charge of the case, I shall be most happy to give place to you."

It is in this, we may almost call it instinctive propensity of woman to deal with remedies, that we find the best explanation of that sometimes agitated and most recondite problem, the primitive origin of medical art. Now, Plato* long ago intimated that if woman had a talent for physic she was as well fitted as man to cultivate it. The evidence that she possesses such a talent is surely very strong. Why, then, is she excluded from the legitimate practice of the art?

It would naturally be thought that her delicate and taper fingers were more fitted to gauge the pulse than man's; that her eyes would at least be as sharp as his in detecting a morbid sign, her ears as quick in catching a morbid sound, her ready wit more apt to analyse symptoms, and her readier sympathy to secure the confidence of the patient.

We must confess, for our own part, to a slight weakness in favour of lady-doctors. It is, perhaps, a faded but still pleasant reminiscence of youthful days. Whatever objection might at first have been experienced by us to the administration of domestic remedies, it was quickly modified when the true representative of *Æsculapius* had to come into the field. The domestic physic, although bulky and disgusting, was still as a rule but a single administration, and usually led to a little after-petting, in which the palate came off most happily. But the doctor's physic, equally offensive, although less bulky, had to be taken with awful regularity at stated intervals; and, adding insult to injury, he would pat our head in the kindest manner, while in the blandest tones, he would quietly put aside the anxious suggestions of mother and nurse, that we might have this or that little knick-knack. "No, no, my dear Madam," he would say, his face creaming with a pleasant smile: "No, no, Nurse, wait a little longer. A little gruel or weak broth is all Johnny requires at present."

Ah! how pleasant it was to read of the doughty Sir Bevis of Hampton, tenderly bephysicked by the lovely Josyan. To hear

* *Republic*, B. v. § 5.

in imagination the nascent hero exclaiming, when as a page he had contrived to kill in one solitary tussle sixty pagan knights, and after a few preliminary affectionate passages, "O Josyan, of thy grace aid me, for I am sorely wounded." "Sweet leman," answered she, "I am a leech equal with the best. No salve exists in all Pagandom, more marvellous than this which I have brought with me. I will be thy warrant for a speedy recovery." Thereupon mingling caresses with surgery, she salves the wondrous youth's gashes, and presently—

"He was both whole and sound,
And all so fierce for to fight.
So is the falcon to the flight."

And again, how grateful to follow Sir Eger at nightfall, after the unhappy issue of his contest with Sir Graysteel. We accompany him as he approaches the castle which stands convenient by the wayside. We see the beautiful young lady, clothed in a scarlet mantle embroidered with gold and pearls, issuing from her bower and slowly advancing to meet him. We hear her courteously proffer to him hospitable entertainment in the castle and the aid of the most cunning leeches in the whole country. We listen to Sir Eger declining this offer, but asking for rest and quiet for a single night. We see this charming lady, accompanied by her damsels, leading the mailed knight into her bower, and seating him on her own bed. Then baked fowls, spiced wine, and "bread of main" are set before him, and the hostess, with her own fair hands, washes the dust from his eyes, and with a refined courtesy takes no heed of Sir Eger's missing little finger, the sign that he has been vanquished. The glove was whole, but the finger was missing, and she might well know it was no accident; but perceiving that he "thought shame" of it, she did not ask either for his name, or from what country he came, or where he was going, but "eased him in all manere." She gives him a drink of great restorative virtue, and although,

"More weak and weary might no man be,
And dried of blood as any tree,"

he soon revives, and is able to "speak and answer make."

"She and her maids, those ladies three,
Of all my gear they spoiled me;
Both of mine hauberk and mine actown,
Washed me syn, and laid me down.
With her own hands, white as milk,
She stopped my wounds full of silk,*
And syn laid me into a bed
That was with silken sheets spread."

* "Common lint," says Ellis, "most probably answers the purpose better: but while silk was a novelty, it was thought to possess many medical as well as other perfections."

The knight is now left to his repose, but the lady and her maidens assiduously watch him during the night, "amusing themselves with songs of love, till the notes of the birds from the neighbouring arbour warned them of the approach of day. The lady then brings to him in a horn, a medicated drink of a green colour, which was so potent that his pains immediately vanished. She again dressed all his wounds, drew from her wardrobe a silken shift, which she put on over his shirt, and then braced on his armour, the weight and pressure of which no longer distressed him."*

Who that is sick does not envy Sir Guy or Sir Eger his fair doctor?

The acquirements of some of these lady-physicians surpassed even those of the highest class of modern graduates in medicine, and were immeasurably beyond the most recent suggestions of the Medical Council for the better education of students.

Thus Felice who played such cruel pranks with poor Guy of Warwick's affections, and who is described as being gentle and demure as a ger-falcon, and courteous, free, and wise, was learned in the seven arts, "withouten miss." She was familiar with astronomy, and practised in arithmetic and geometry. "Of sophistry she was also witty," as well as of rhetoric; and she was a skilled musician, while in her knowledge of science none could equal her. All this learning was simply accessory to and for the purpose of furthering her proficiency in medicine.

Again, as another example, there is the rich lady, who, as we learn from the tale of "*Les deux Amants*," in Marie's lays, resided and had studied medicine at Salerno for *thirty* years. In that celebrated school she had acquired so profound a knowledge of *salves* and *drugs*, *herbs* and *roots*, *electuaries* and *drinks*, that she was enabled to concoct medicaments, second only in virtue to that great desideratum, the Elixir of Life.

Although, however, in the age of chivalry, some knowledge of medicine, and the art of dressing wounds, formed a portion of the accomplishments of all properly educated ladies, they were not on that account looked upon or recognised as regularly trained physicians. They were, in fact, amateurs who made up for the paucity of regular leeches; and their acquirements chiefly fitted them to play the part of clever nurses. They acted, moreover, mainly in the absence of, or in conjunction with, the proper leech. Thus Sir Eger's fair physician dresses his wounds and administers to him physic only after he has refused the aid of the ordinary leech; and in the legend of Chaitivel (Marie's Lays), the Queen of Beauty, in succouring the sole surviving knight who has fought

* See Ellis's *Early English Metrical Romances*.

for her favour, summons to her aid the three best physicians to be had, and, together with them, attends to his necessities.

One of the happiest indications of the actual relation of the lady-leech of the middle ages to the true leech is found in Chaucer's "Nonnes Preestes Tale." Chanticleer, it so happened, was disturbed one night by ill-dreams. Much depressed thereby he made moan to Dame Partlet, perched by his side. But she cried, Fie upon him! and reproved him sharply for being alarmed by a dream. "Han ye no manne's herte?" quoth she, "and hav a berde?"* and then she proceeds to expound to him how dreams arise from repletions and "oft of fume and of complexions," and concludes that his dream had arisen from superfluity of his "rede colera parde." She clenches her argument by citing Cato's advice not to heed dreams, and then proceeds to recommend her spouse Chanticleer what to do to obtain present relief, in the absence of an apothecary:—

"Now sire," quod she, "when we flee fro the bemes,
 For Goddes love, as tak some laxatif:
 Up peril of my soule and of my lif,
 I conseil you the best, I wol not lie;
 That both of coler, and of melancolie,
 Ye purge you; *and for ye shal not tarie,*
Though in this toun be non apotecarie,
 I shal myself two herbes techen you,
 That shal be for your hele, or for your prow;†
 And in our yerde, the herbes shall I finde,
 The which han of hir propretee by kinde
 To purgen you benethe, and eke above.
 Sire, forgete not this for Goddes love,
 Ye be ful colerike of complexion:
 Ware that the sonne in his ascencion
 Ne finde you not replete of humours hote:
 And if it do, I dare wel lay a grote,
 That ye shal hav a fever tertiane,
 Or elles an ague, that may be your bane.
 A day or two ye shal have digestives
 Of wormes, or ye take your laxatives,
 Of laureole,‡ centauria, and fumetere,§—
 Or elles of ellebor, that groweth there,
 Of catapuce,|| or of gaitre-berries,¶
 Or herbe we growing in our yard, that mery is:
 Picke hem right as they grow, and ete hem in.
 Beth mery, husbond, for your fader kin
 Dredeth no dreme; I can say you no more."

The history of a remoter period records the names of several

* Beard.

† Profit.

‡ Spurge-laurel.

§ Fumitory—"purgat bilem et humores adustos."—Ray's Synopsis.

|| A species of spurge.

¶ Berries of the dog-wood tree, *Cornus femina*.

females who attained celebrity in the practice of medicine, chiefly in its relations to midwifery and the diseases of women. But as in the middle, so in earlier ages, we never find the names of those who had become thus celebrated, included among the true representatives of *Æsculapius*. The midwife of ancient Greece, in the time of Hippocrates, held no higher position than the midwife of a later period, before the practice of obstetric art passed almost entirely into the hands of men; and it is most probable that in difficult cases the regular physician was had recourse to. The story of Agnodice shows that even at the early period when she is presumed to have lived, the practice of midwifery was not entirely confined to women. A law had been passed in Athens, prohibiting females not only from acting as midwives, but from exercising the art of medicine in any form. This law had been called for in consequence of a prevalent custom existing among midwives and female dabblers in physic of procuring sterility and inducing abortion. Aspasia and Laïs two of the most noted of the female physicians of antiquity, it may be remarked in passing, obtained their celebrity chiefly through their knowledge of drugs adapted to these nefarious ends. In the Oath found among the works of Hippocrates, the young physician is required to swear that he will not produce abortion.—“A notable instance,” as Adams says, “how much our author (Hippocrates) was superior to his age in humanity as well as intelligence.” Agnodice studied medicine secretly and practised midwifery in the disguise of a man; but being detected, she only escaped death by the powerful intercession of the principal women in Athens.

The practice of physic affected by the ladies of ancient days, would seem to have borne pretty much the same relation to the orthodox physic of that time, which the domestic medicine of the present day does to the orthodox physic of the present time. There were distinguished and historical Lady Bountifuls then, as there have been since, and the lady mesmeric, spiritualistic, and homœopathic practitioners of our own day, are the analogues of the witch-doctress of an earlier date, and the votress of Circe and other irregular healing goddesses of a still more remote period. Humanity was the same at the bottom in all ages.

Becker, in his *Charicles*, or illustrations of the social life of the ancient Greeks, represents the restless invalid as not content with seeking aid from the descendants of *Æsculapius*, but as having recourse also to enchantments, consulting the interpreters of dreams, placing expiations in the cross ways, and summoning aged women reputed to have the power of curing diseases by mysterious arts and magic ways, while whole days and nights were passed in the temple of *Æsculapius*.

Substitute “spiritualism” for enchantments, the clairvoyant

for the interpreter of dreams, fees to charlatans for expiations placed in the cross ways, "mediums," or wise-women, a race not quite extinct, for the ancient witch, and medicated or Turkish baths for the temple of Æsculapius, and the picture is applicable to the present time.

That woman has never been admitted within the ranks of legitimate physic since it obtained recognition as a distinct science, notwithstanding her propensity to meddle with the healing art, may be looked upon as a pretty clearly established historical fact. The Asclepiadæ, the descendants of Æsculapius according to one version, the priesthood according to another, regarded the knowledge of medicine as a sacred trust, and bound themselves by oath (as recorded by Hippocrates, himself one of the Asclepiadæ) "to impart a knowledge of the Art to their own sons, and those of their teachers, and to disciples bound by a stipulation and oath according to the law of medicine, but to none others."

Why woman should have been excluded from the knowledge of medicine at its earliest origin as a separate profession, it is not difficult to surmise, without having recourse to the notion of a superstitious prejudice, or of the superior qualifications of man intellectually. The Father of Physic, in his admirable ideal portraiture of a true physician, "The Law," has laid down that whoever is to acquire a competent knowledge of medicine ought to be possessed of the following advantages:—a natural disposition; instruction; a favourable position for the study; early tuition; love of labour; and leisure.

From what we have already said it may be conceded unreservedly that woman has a natural aptitude for medicine; and it may also be granted that her intellectual capacity fully qualifies her for instruction, which instruction would follow if all other requirements were in conformity. But the real hitch commences in the question of her favourable position for the study. So long as maternity was (and is) looked upon as the crown of womanhood, the social and domestic duties which are a necessary consequence of marriage, would govern the early tuition of woman. This tuition would not only be unsuited to the acquisition of medicine, but it would also destroy that love of labour and deprive woman of that leisure which Hippocrates enumerates among the advantages to be possessed for that acquisition; since the leisure required is such as would be consistent with the proper study of medicine, and the love of labour such as would secure the right achievement of that study. But when, as in the case of woman, there was a primary and absorbing object of life in view, wife-hood, which rendered necessary a special training, it is evident that neither the leisure nor the labour could be accorded which are requisite for rightly mastering of physic.

It may reasonably be presumed that the ancients, in excluding woman from the study of medicine, reasoned somewhat after this fashion (as we reason now), if in fact they reasoned upon the matter at all. For it is just as probable, if not more so, that woman dropped quietly into the position which she holds with regard to medicine, by the natural action of her own feminine instincts. Be this as it may, however, those who of late years have advocated the admission of woman to the study of medicine, clearly see that, notwithstanding the hard verbal fashion in which they are accustomed to deal with poor male humanity, the chief obstacle is the domestic bias of woman herself and its consequences.

Thus Miss Dall, one of the most strenuous advocates of the fitness of woman for a more extended field of employment than is customarily yielded to her, and the object of whose life has been, to use her own words, "to inspire in woman a desire for *thorough training* to some special end, and a willingness to share the training of men both for specific and moral purposes," in a recent work,* makes known the history of a female physician, in the hope that it may do what her words never could, namely, "inspire women with faith to try their own experiments, give them a dignity which should refuse to look forward to marriage as an end, while it would lead them to accept it gladly as a providential help." But, alas! although generous men came forward to Miss Dall to carry out her plans for training women more largely to some business occupation, she was foiled by the women themselves. "The best printer in Boston said, 'I am willing to take women into my office at once, if you can find women who will submit to an apprenticeship like men.' On the same conditions, a distinguished chemist offered to take a class of women, and train them to be first-class apothecaries or scientific observers, as they might choose. To these offers there were no satisfactory responses. 'Yes,' said the would-be-printers, 'we will go into an office for six months; but, at that time, our oldest sisters will be married, and our mothers will want us at home.' 'An apprenticeship of six years!' exclaimed the young lady of a chemical turn; 'I should like to learn very much, so that I could be a chemist, *if I ever had to*; but poison myself for six years over those 'fumes,' not I.'"[†]

Undoubtedly the notion that the chief aim of woman's existence should be centred in a domestic life, has, on the one hand, narrowed for her the field of self-dependent labour, and, on the

* A Practical Illustration of "Woman's Right to Labour;" or a Letter from Marie E. Zakrzewska, M.D., late of Berlin, Prussia. Edited by Caroline H. Dall, Boston (U.S.) 1860.

† Op. cit., p. 2.

other, unfitted her too commonly for that labour. All honour, therefore, be to those energetic women who in view of the evils so frequently arising from these sources, are earnestly teaching the importance of training women to self-dependent exertion from girlhood. But we venture to suggest that the problem for solution is, in what manner this training can be effected without blunting the feminine qualities of woman, and not, as the ultra-teachers of this school, such as Miss Dall, for example, would have it, in what manner woman can be most nearly approximated in thoughts and habits to man. It is not so much a question, as these teachers will persist in arguing, of the intellectual or physical qualifications of woman for the different kinds of labour which have been monopolized by man, or any one of these, but it is a question of her moral fitness; for it is upon her moral and not upon her intellectual peculiarities that the chief characteristics of woman depend. Hence, in opening out new fields of labour to woman, the primary, the all-important question is, in what manner the preliminary and actual training required for them would affect her moral—her feminine qualities. And since upon these qualities depends the whole secret of domestic life, and all man's efforts are subsidiary to that life, and that upon its sacredness rests the integrity and progress of all true civilization, the question is by no means one which simply affects the condition of woman herself, or which can be dealt with by crude and vague notions of certain abstract "rights of labour" which woman may be presumed to possess.

There are probably several branches of labour, both manual and intellectual, which may still advantageously be thrown open to woman, but among these we do not rank medicine. We cannot conceive the possibility of woman studying, and above all, practising medicine, in any way worthy the name of study or practice, without to a greater or less extent unsexing herself. It would almost seem, in fact, as if this were done in anticipation by the proposition urged, and the attempts made, to pursue the study promiscuously with man; but we believe (at least we are wishful to suppose so) that both the proposition and the efforts made to carry it into effect, arise from sheer ignorance of the intimate requirements of medical art. But it may be said the experiment has been tried, and with success. We admit it, and the success neatly clenches the validity of our objection. Miss Dall, in the work referred to, publishes the life of Marie E. Zakrzewska, a Prussian midwife of unusual attainments, and who, by indomitable energy and perseverance, succeeded in obtaining admission to one of the American colleges, and graduating very honourably in medicine there. But at what a cost! She prides herself in ignoring and contemning

all those feminine duties which have hitherto been looked upon as the chief of woman's claim to respect and honour, and she comes before us not as an ennobled woman, but as a feeble, feminine caricature of man! Miss Dall has given Dr. Marie E. Zakrzewska's life to the world as a triumphant illustration of women's capacity for masculine studies, and as an incentive to aspiring women. We strongly recommend all who are interested in this question to read the remarkable history. We are willing to admit that this lady may possess as a physician those high attainments which Miss Dall claims for her, but we look upon them as a miserable equivalent for the loss of those feminine traits which she makes so obtrusively, and it may be said boastfully, evident.* It is curious how ignorant, or wilfully heedless the ultra woman's rights advocates seem of the ways of the world. The ideal notion of the female physician comes to us recommended by the pleasant blending of the true feminine virtues of the woman with the qualifications of the physician. But in the example here presented to us, the female physician is divested of all those qualities which are so loveable in woman, and is represented solely as striving at the masculine standard of the physician. Is it so sure that the physician, who is but an imitation—a *quasi*-man, would be as well qualified to secure the confidence of the patient, whether male or female, as the physician who was the true man.

Still more instructive than Dr. Marie E. Zakrzewska's life is the fate which has befallen another American female physician, one of the best known and most distinguished of her class, and one who had won for herself the high respect of the medical authorities of Europe. She attempted to establish herself in general practice; yet although she had the sympathies of a large

* She revolts at the "common routine of domestic life" (p. 72), and has a private horror of knitting and sewing "under all conditions" (p. 156)—very commonplace avocations we admit, but commonplaces of that class without which the world would fare very badly. Did Doctor Marie Zakrzewska never reflect how the lack of aptitude for such commonplace occupations, in those women who were early trained to some special bread-getting occupation, was a very common source of domestic unhappiness, which alike demoralized husband, wife, and children? But Doctor Marie Zakrzewska's masculine propensities, it is but just to say, date from childhood. She tells us that she "joined the boys in all their sports; sliding and snow-balling with them in winter, and running and playing ball in summer. With them I was merry, frank, and self-possessed; while with the girls I was quiet, shy, and awkward. I never made friends with girls, or felt like approaching them." (p. 24.) As a girl, "she could not see why, at home, she should be bound to do housework when she wanted to read, while her brother, who wished to work, was compelled to study." (p. 39.) On her return home from school she began her apprenticeship in household duties, but as soon as the novelty wore off they "became highly burdensome," and were of course neglected, much to the discomposure and dissatisfaction of the household. (p. 43.) As a girl also, when a patient in the hospital, asking the physician under whose care she was, for books "about history," he gave her "two huge volumes—*The History of Midwifery* and *The History of Surgery*," which she read with interest!

circle of wealthy and influential friends, as well as physicians, she failed of patronage, and consequently of success. "She was found," says our authority,* "unable to meet the exigencies of the every-day duties of her profession, as every one practically familiar with the exacting nature of those duties would have foreseen. The storm, the cold, the night, the distance, were barriers which she could not overcome without assuming the habits, dress, and manners of the opposite sex. And often the disease which she encountered was of such a nature as to compel her either to unsex herself in regard to her instinctive habit of reticence and modesty, or preserve her feminine sensibilities by neglecting her professional duties. Subsequently she became the medical head of a private charity for the treatment of sick women, in which capacity her medical education is admirably adapted to develope and give efficiency to her natural tastes and her instincts, and thus render her life one of eminent usefulness."

It is significant that such success as Dr. Marie E. Zakrzewska had in practice was chiefly through her establishing an "Infirmary," in conjunction with Drs. Elizabeth and Emily Blackwell, and that she is now the head of a hospital in connexion with the New-England Female Medical College.

These illustrations sufficiently indicate the nature and the reality of the very grave objections to the study of medicine by females. It is not, we repeat it, any doubt of their intellectual or even physical capacity for the study and practice of medicine which governs our objections, but the impossibility of believing that the preliminary training requisite, the prescribed course of medical study itself, and the subsequent practice of the art in its integrity, can be consistent with woman retaining her true womanly habits and feelings.

If the question of female physicians were one which rested upon any real social or philanthropic need, it would at least appeal to our sympathies, but such is not the case. It arises incidentally, as we have seen, out of a fantastic doctrine of the "social rights" of women, which seeks to approximate her training and social status in every possible respect to that of man—aiming to make woman as masculine as practicable, and chafing that, after all, she must physically be woman still.† Consistently with this doctrine, we

* *American Medical Times*, July 23, 1861.

† Of the style of thought which passes for philanthropy among thinkers of this class, the following specimen may be taken from Doctor Marie Zakrzewska's life. She is writing of the experience of life she had gained when a girl by accompanying and aiding her mother, a Berlin midwife, in her professional visits and duties:—"One fact I learned, both at this time and afterwards, namely, that men always sympathise with fallen and wretched women, while women themselves are the first to raise and cast the stone at them. Why is this? Have not women as much feeling as men? Why, women are said to be made up entirely of feeling. How

find its disciples, as if desirous of demonstrating their contempt for the hitherto received notions of female propriety, insisting upon the study of medicine as one peculiarly fitted for women, and also insisting upon their right to study, and the fitness of so studying, promiscuously with men. That is to say, we, who have been taught by experience that the education of males and females is best carried on apart the one from the other, are asked to admit that under circumstances which would usually be considered most obnoxious to the society of the sexes, a specific training in company is not only proper but advisable. Miss Dall protests* against the medical training of women in separate colleges, and hopes to see the conventional obstacles which have rendered this separation necessary, done away with in due time.†

It is curious to note, in further illustration of the sentiments of those ladies who belong to this school of thought, how subsidiary a position midwifery apparently holds in their estimation. To a woman of genuine feeling, with an inclination towards medicine, it might be supposed that the obstetric art would possess

does it happen, then, that women condemn where men pity? Do they do this in the consciousness of their own superior virtue? Ah, no! for many of the condemning are no better than the condemned. The reason is, that men know the world; that is, they know the obstacles in the path of life, and that they draw lines to exclude women from earning an honest livelihood, while they throw opportunities in their way to earn their bread by shame. All men are aware of this; therefore the good as well as the bad give pity to those who claim it. It is my honest and earnest conviction, that the reason that men are unwilling for women to enter upon public life or business life is, not so much the fear of competition, or the dread lest women should lose their gentleness and thus deprive society of this peculiar charm, as the fact that they are ashamed of the foulness of life which exists outside the house and home. The good man knows that it is difficult to purify it. The bad man does not wish to be disturbed in his prey upon society. If I could give to all women the least part of my experience, they would see that this is true; and would see, besides, that only faith in ourselves and in each other is needed to work reformation. Let woman enter fully into business, with its serious responsibilities and duties; let it be made as honourable and as profitable to her as to man; let her have an equal opportunity for earning competence and comfort, and we shall need no other purification of society. Men are no more depraved than women; or rather, the total depravity of mankind is a lie." (p. 45.)

* *Woman's Right to Labour.* Boston, 1860.

† Dr. Marie Zakrzewska thus writes of her association with the male students in the School of Midwifery, Berlin:—"My relation with these young men was of the pleasantest kind. They never seemed to think that I was not of their sex, but always treated me like one of themselves. I knew of their studies and their amusements; yes, even of their mischievous pranks that they were planning both for college and for social life. They often made me their confidante in their private affairs, and were more anxious for my approval or forgiveness than that of their relatives. I learned during this time how great is the friendly influence of a woman even upon fast living and licentious young men; and this has done more to convince me of the necessity that the two sexes should live together from infancy, than all the theories and arguments that are brought to convince the mass of this fact. As soon as it became known among the students that my youth was the new objection [to her being admitted to the hospital], they treated it in such a manner that the whole thing was transformed into a ridiculous bugbear, growing out of the imagination of *virtuous* opposers." (p. 60.)

unusual attractions. To meet and emulate upon his own ground, and finally, perhaps, dispossess the man-midwife, would be a natural object of ambition ; to ennoble the female practice of midwifery, and open it out to a more highly educated class of women than have commonly practised it hitherto, would be a still loftier object. Woman has already attained the highest scientific distinction in midwifery (witness Mesdames Boivin and La Chapelle), and it would be hard to say that there is not a wide and noble field still open to her in its cultivation, if she were so disposed. The field, moreover, is a legitimate one, and the obstacles in the way, although sufficiently great, are perhaps not more than would suffice for a stimulus to one whose heart was in the matter and who was wishful to set a good example to others. But, singularly enough, feelings of this kind seem to exercise but a very slight influence over these ladies.

Dr. Marie E. Zakrzewska was originally educated as a midwife, and her ability was such that, when only twenty-two years of age, she received the appointment of chief midwife in the Royal Hospital at Berlin. She had also been legally appointed assistant to the professor in the School of Midwives, Dr. Schmidt, having displayed high qualifications as a teacher, and with the avowed intention on his part that she should become his successor—a hope, however, cut short by his sudden death on the day when she was to have commenced her duties as assistant professor. Internal dissensions in the hospital, by which she was victimized, caused her, soon after Dr. Schmidt's death, to resign her post. She did not lack friends in Berlin ; and not only was there the prospect before her of establishing a practice, but it had been suggested, and had met the approval of the physicians who befriended her, that a private hospital should be formed and put under her charge. She had been playfully termed *La Chapelle the Second*, and there was little reason to doubt that she would have justified the appellation, and that she might probably look forward to obtaining European celebrity. It may be readily imagined how a success of this kind could have been made available to opening the practice of midwifery more fully to females ; but to justify woman's right to labour in this fashion does not seem to have occurred to her.* She set the advantages she possessed aside, and emigrated to America, seduced by the prospect of being able there to graduate fully in medicine,† and submitting to a bitter

* The American Secretary of Legation at Berlin (1853), T. S. Fay, in a certificate attesting Miss Zakrzewska's claims, states that the acknowledged excellence of the midwives of that city threatens to monopolize the obstetric art.

† "I had come here for a purpose," she writes, speaking of her first arrival in America, "to carry out the plan which a despotic government and its servile agents had prevented me from doing in my native city. I had to show to those men who had opposed me so strongly because I was a woman, that in this land of liberty,

struggle with poverty to attain her end—a struggle which, however, chips off the veneer of misdirected thought, and enables us to see the true woman. For while earning her bread by wool-work in New York, she contrives effectually to aid some of her own distressed or lost sex, giving an asylum to several, even in her own house, and teaching how woman can truly ennoble herself.

Neither in the origin, nor the development, nor the results (so far as these are yet apparent), of the question of female physicians, has there been any sufficient reason advanced why our schools of medicine and medical diplomas or licences should be laid open to female students and candidates; and there are certain manifest and most weighty reasons arising from the intrinsic nature of medicine, why this course should not be adopted. It does not follow that these reasons are mere conventional prejudices, because certain persons are to be found with whom they have no influence, and that in America chartered medical schools have been established for females exclusively, and also for males and females, while public opinion there sets strongly in favour of the medical education of females. The establishment of these schools merely shows that there is a class of people with whom certain old-fashioned, but as yet very vital and fundamental notions of feminine duty and propriety have become greatly modified, and that it is prepared to test the correctness of its views by experience. Hitherto the results have not been such as to remove, but rather to confirm, the objections we have noted.

We can conceive that many plausible reasons might be advanced for training female physicians to practise in midwifery, and the diseases of women and children; but, as the question has never been broached in this form, we need not dwell upon them.

Woman always has and ever must play an important part in the art of physic, a part which has been assigned to her for ages, and which offers the widest scope for the exercise of her highest intellectual and moral attainments. Hippocrates, in the Oath we have previously referred to, swears by "Apollo the physician and Æsculapius, Health and All-Heal." Health (*Hygeia*), and All-Heal (*Panacea*), and Brightness (*Ægle*), and Recovery (*Jaso*), were the four daughters of Æsculapius. To his two sons, Podalirius and Machaon, Æsculapius bequeathed the science and art of healing, to his four daughters those virtues without which

equality, and fraternity, I could maintain that position which they would not permit me at home. My talents were in an unusual direction. I was a physician, and as such, had moved in the most select circles of Berlin. Even my enemies had been forced to give me the highest testimonials [testimonials as a midwife are alone specified], and these were the only treasures I brought to this country."—(p. 97.)

all physic must prove of no avail. Hygeia is the deified representative of the many feminine virtues which in maternal and domestic life are requisite to secure the health of childhood and youth and to promote a vigorous maturity; Ægle watches over the perfection of Hygeia's cares; Panacea is the tender nurse whose affectionate kindness in sickness soothes the fever-tossed or pain-racked sufferer, and whose watchful care fosters the all-healing powers of nature, and facilitates and perfects the feeble efforts of art; Jaso cherishes Panacea's completed work, and renovates the convalescent's exhausted, but now no longer disease-oppressed powers.

The deified daughters of Æsculapius, in fact, represent with tolerable accuracy the notions which have been customarily held from remote to the most recent times of the proper relationship of Woman to medicine, and to these notions we hold. The midwife is no true exception; for labour is a natural process, and her relation to it was, and is, simply in its natural phases, and not in those unfortunate modifications of the process, which from the beginning of medicine rendered the aid of the physician occasionally necessary, and which ultimately led to midwifery becoming a branch of medical science and a part of his duties.

ART. V.—ORIENTALISM.

DURING the Middle Ages, intercourse between Europe and Asia was almost entirely suspended. Far from seeking to unite, each was, by the course of events, separated more and more from the other. There was nothing in common between the asceticism of the cloister and the soft affluence of the curtained verandah. For a moment, indeed, they may have interchanged a few tokens of recognition, for it is recorded of Charlemagne that, in the eighth century, he opened some diplomatic relations with Harun al Reshid,* our early friend of the *Arabian Nights' Entertainments*; but with the exception of this transient glimpse, Asia remained hermetically sealed against Europe for the space of nine long and gloomy centuries.† Even the Crusaders sought nothing beyond Jerusalem delivered and the seaboard of the Holy Land. In the estimation of those high-minded soldiers and devotees, the depths of Asia were the regions of heathenism, sorcery, and spiritual darkness. In the charming cadence of his well-regu-

* Gibbon, c. 49, vol. v. 4to ed., p. 145.

† Some distant communication was always kept up by means of commerce. During the Middle Ages, Antioch, Damascus, and Aleppo carried on the East India trade with Constantinople, Venice, and Genoa; but these cities sank into insignificance when trade took another direction, and went round by the Cape.

lated stanzas, Tasso has represented the prevailing notions of mankind in this respect, not merely with the eye of a poet, but with the pen of a master. About two hundred years before the discovery of America by Columbus, Marco Polo had traversed some portions of the East; and the mystery of the Indies was at last cleared up by the rounding of the Cape of Good Hope. The European family congratulated itself on discovering its own cradle in the East, and started anew on the laudable task of exploring the entire circle of the globe. To Sir William Jones may be ascribed the original merit of making us first acquainted with the language and poetry of the Hindoos, in the same manner as Sir Henry Rawlinson and Mr. Layard have, some fifty years later, restored to us the long-lost arcana of Persia and the monumental archives of Babylon.

The influence of Orientalism has been gradually on the increase throughout Europe for the last three hundred years. Camoens, who, as far as we can understand him, is but a sorry writer, owes what interest he possesses to a tropical subject, mixed up with a strange confusion of pagan gods and goddesses, grossly out of place between the mouth of the Tagus and Trincomalee. In this country, the Oriental idea dates back as far as a hundred years or more. Collins' *Oriental Eclogues*, which are masterpieces of their kind, particularly the second eclogue, were composed about a century ago, 1740. *Rasselas* is Oriental: the *mise en scène* is entirely Oriental: the sentiments are gloomy, without a ray of hope, and imbued with a dark tinge of fatalism. *Vathek*, the brightest of dreams and the most eloquent of tales, the most panoramic of scenes, and the most densely populated of novels, is unmitigated Orientalism. *Lalla Rookh* is the same—soft, effeminate, showy, and evanescent. None of these works of fiction, not even excepting *Rasselas*, the first among the first-born of sturdy writers, pretends to satire, or to that acute dissection of society which is the property of Pope and Molière among the moderns, or Terence and Plautus among the ancients. On the contrary, what they cannot approve of they lament, and what they cannot correct they disdain. But such is the relish for Orientalism among modern readers, that the costume alone is sufficient to give them a passport to a good reception. The sight of the turban is enough. It was so of late. The interest awakened by the Crimean war touched a sensitive chord in every nation of Christendom, which responded to the call, and hastened to the aid of the Turk threatened by the overpowering forces of Romanoff. There must be some universal feeling alive in the present day, that finds its analogue in the heart of the East, although it is not easy to say in what that analogy consists. For the morals of Mahometanism are not, nor ought to be, the same

as ours. They are not those of ancient Greece or Rome at their most depraved periods. The stern censorship of Tacitus or Juvenal, and the keen irony of Horace, have no counterpart in anything we read of in the history of the Osmanli Turks.* Pagan society never reduced woman to the infamy of the harem or the seraglio.† Polygamy was never in vogue among them, nor even so much as countenanced by the Cæsars of Italy or the demigods of Greece. Their morality was low enough, but most assuredly it was exempt from this disgrace, at least. Possibly, Mahomet never intended to introduce the practice, but was carried away by the pressure of the times, and forced to yield to the popular inclination; and it was far easier to put the cimeter in the hands of his followers, and bid them go forth and conquer, than to prescribe for them rules of virtue which would never be observed. Sanctity and chastity were beyond his reach. Wherein, then, does the sympathy between the East and the West consist? Is it in the softness of social manners, and those luxurious modes of life that foster sensuality? or in a style of literature morbidly sensitive and overre-fined? or in the love of wealth and parade? or in none of these, but only in a passing fancy of the age? And yet one would think it is something deeper than this.

Look at the First Napoleon—his character is scarcely occidental. Its wildness, its swooping genius belongs to the East. It reminds us of Tamerlane or Zenghis Khan, or those Saracenic chiefs who swept along Africa, crossed the Straits of Gibraltar,

* Creasy's *Ottoman Turks*, 2 vols. Bentley, 1856.

† THE ROYAL MARRIAGE LAW OF TURKEY.

To the Editor of the Times.

Sir,—Permit me to correct an error in your article on the state of Turkey. You speak there of "four or five wives of Abdul Medjid." But it is matter of history that no Sultan of the Ottoman race has been legally married since the days of Bajazet the Great. On his capture by Timur, after the battle of Angora, the Sultana was treated with gross insult, and to guard against the shadow of a chance of such a disgrace recurring no inmate of the Seraglio has for more than 400 years been a legitimate wife according to Mussulman law.

July 13, 1861.

CANTEMIR.

"When one considers that the most beautiful girls among the Mussulman population of the empire usually find their way to the Bosphorus, and that, besides these, Circassia and Georgia contribute largely to the harems of Constantinople, the number of really pretty women to be seen at the Sweet Waters or other places of resort appears small."—*Times*, July 22, 1861.

There were in the worst times among the Gentiles, some few in whom, as Cicero says in his defence of Sextus Roscius, Amer. X., alluding to Cæcilia Metcho, the wife of Sylla, remained, as if for the sake of example, the vestiges of ancient duty—in quâ muliere, quasi exempli causâ, vestigia antiqui officii remanent. And Pliny speaks in remarkable terms of Fannia, a Roman matron, 'quæ sanctitas! quanta gravitas! quanta Constantia! non minus amabilis quam veneranda!'—*Epist.* vii. 19. The language could not be more devout in the brief for the canonization of some saintly virgin or widow. Tacitus mentions Occia, a vestal virgin, as a woman *summæ sanctimonie*. And yet Cicero divorced himself from Terentia, to whom he had been married for thirty years, and Cæsar repudiated his exemplary spouse because she had been unjustly aspersed.

occupied Spain, penetrated the passes of the Pyrenees, and broke their strength against the steel-clad chivalry of the North. So strong is the taint of Orientalism, or of Saracenic blood, in Napoleon, that he was usually followed into battle by a mounted Arab in true Asiatic costume. His proclamations, which have been so severely criticised and censured, breathe the spirit of Oriental poesy in the court and camp. When he shouted to his soldiers, *Vous êtes descendus des Alpes comme un torrent*, or when, on another occasion, he declared, *Je suis le dieu des armées*, did he use the polite and courtly phraseology of Louis XIV.? Was it not rather the language of Eastern hyperbole, such as might have been spoken by the Mahomet of the West? At Aboukir, Cairo, or Mount Tabor, Napoleon rehearsed or found a language of his own.

His life is an epic belonging to the class of heroic legends. He touched the four quarters of the globe. He disputed our arms in India and America at the same time that he bestrode the confines of Asia, Europe, and Africa with the armed tread of a warrior. And yet, the same hand that hewed the Simplon and carried the flag across the bridge of Lodi, was the first to accept from the pen of St. Bernardin de St. Pierre the gentle dramatic tale of Paul and Virginia. He is always poetic and sublime. On the top of the eternal pyramids or amid the flames of the burning Kremlin, at the glorious sunrise on the plains of Austerlitz, or upon the solitary rock amid the waves of the wide Atlantic, he stands single and alone. He is the chief object of interest, when, in the zenith of his power, he dictated the terms of peace and war from his imperial throne at the Tuileries, or, when in the day of his reverse, he turned pale in the gloomy grandeur of defeat on the field of Waterloo. He ruled the spirit of the age, and impressed on the destiny of mankind an image of his own, as ineffaceable as the hand of time, and as enigmatical as that of a genie of the East.

The next potentate over the minds of men was the poet Byron. No one, merely by the aid of his pen, ever effected so great a change in thought and sentiment as the author of *Childe Harold*. In the writings of the *Poets of the Lakes*, as they were styled, as well as in those of the pantheist Shelley, whose fancy seems to have followed some Indian ideal, it would be easy to point out the Oriental spirit that actuates them all. The reader will call to mind Coleridge's *Khubla Khan*, and Southey's *Last of the Goths*. Even the charm that pervades Sir Walter Scott's exquisite lyrics is due to their Oriental character, which is derived from the Crusades, and mixed up with a thousand mystic myths and mediæval reminiscences. But Byron surpasses them all in breadth of colouring and grasp of intellect, and includes within his glowing themes the burden of the rest. He once thought of

visiting India, and in fact made some preparations for the journey,* but this project was subsequently restricted to a tour through the Morea, and a sojourn at Constantinople, in company with his friend Hobhouse. A new tie was thus formed between the spirits of the East and West, each link of which was forged of gold or diamonds by the touch of Byron. He alone related for the first time as a matter of fact, what Goethe had chanted only as a fond idea,

Know ye the land where the cypress and myrtle
Are emblems of deeds that are done in their clime ?

And he alone in *Childe Harold's Pilgrimage* lighted up with the fire of a true poet those scenes of nature which captivate the senses and exalt the soul.† But *Childe Harold* revels chiefly on the shores of the Levant, and sinks into luscious repose amid the ruins of ancient Greece, beneath the azure sky that suffuses the waves and mountains of the East. The contrast is strikingly drawn between European activity and Oriental apathy and inaction. The remains of Athens, Troy, and Corinth bask in the sunshine, or slumber amid roses and olives. The silence of the scene is broken only by the spirit of the West. "Lara," the "Corsair," the "Giaour," "Mazeppa," and the "Bride of Abydos," are Europeans in Asiatic costume. The British temper breathes, and pants, and burns, and energizes beneath the tuban, the pelisse, the Oriental trouser, the pointed slipper, and the naked cimeter. As actors they play their parts to perfection, but it is not natural to them. They smack of the sands of Araby the Blest; but their speech betrays them, and they talk English. Even the haughty feudal baron, Manfred the Misanthrope, who converses with the snow-clad peaks of Switzerland, forgets himself, and invokes Ahriman and Ormuzd, the dæmons of the East. The fire-fays and elves of Persia appear upon the crags and vanish in the mists that boil up about the glaciers of the Wengern Alp. The fiction is consummately worked out; but the personages do not properly belong to the eastern or western hemisphere. To what particular country do Gulnarez, Medora, Kaled, Zuleika, or Leila belong? Certainly not either to England or Turkey. They are fatalists inspired with the impulsive temper of the North. Medora, the dreamy, pensive, broken-hearted Medora, is not a genuine Algerine. She is a Scotch lassie at heart, and a pretty little Christian playing the Turk.‡

* Moore's *Life of Byron*. Murray. 1860. p. 73.

† These scenes are now consigned to those useful pages, bound in a limp red cover, and 'ycleped *Murray's Handbook for Travellers*.

‡ The *furor* that still actuates the public in favour of Byron may be exemplified by the following paragraph:—

SALE AT NEWSTEAD ABBEY (NOTTS).—On Friday there was a sale by auction

But it is in Germany that the Oriental spirit has made the greatest progress. It is not possible to say when, where, nor how it first entered and mixed itself up with the German tongue, whose Indo-Germanic root is now universally acknowledged. The speculative turn of thought, or idealism, of their philosophy reminds us of the Gymnosophists of Hindoo. The ancient German mythology is almost entirely Eastern and extravagant. Odin's skull is a microcosm comprehending the universe. Its present analogue is the pantheism of the German schools.

Goethe embellished his poems with the choicest Asiatic morsels and allusions. Sometimes it is an Indian legend which becomes an ode to the Deity—a pearl, as it were, from the gulf of Golconda finely engraved by the lapidary from Weimar: at other times he breathes nothing but Islamism. Collected as if in Divan, his couplets seem to have been copied from the dome of the mosque at Mecca. The style of thought, sentiment, and language is entirely Asiatic—not Asiatic and European, the Cross and the Crescent combined—but pure and absolute Orientalism—oppressively calm and superbly monotonous—the coloured daylight of the Alhambra, the twilight of the East. Lara, the Giaour, and the Corsair find no footing there.

Closely associated with this Oriental turn of thought is a profound melancholy and an air of inveterate scepticism. It has been a fashion of late years to feign this mournful tone, perhaps in imitation of its distinguished prototype, Byron.* It is sup-

at the Abbey of valuable effects, formerly the property of Lord Byron. Many of the lots realized only moderate prices. Four papier-maché decanter stands, formerly Lord Byron's, were sold at 15s., the positive value of all being about 4*d*. The model of a frigate, the property of the deceased poet, sold at 3*l*. 15s., the value being less than half that sum. A snuff-box, with a portrait of Byron, but not stated to have any other association, went at 10s. A parian figure of a sleeping Cupid, the property of Lord Byron, sold at 15s. The first printed copy of his early poems, with autograph, after a vigorous competition, fetched only 6*l*., Mr. Webb being the purchaser; and a pair of brass candlesticks, used by his lordship in college, were bought in by the same gentleman at 3*l*. 10s. Lord Byron's punch-bowl, broken, but repaired, and not, perhaps, worth one shilling, realized 3*l*. 5s. A marble bust, life size, of Charles I., on marble half column, chiselled with great delicacy, sold at 15*l*., to Mr. Redfern, of Warwick; and a bust, in the same size and style, of William III., at the same price, to Mr. Woodgate, of London. Musical instruments and portfolios of music, the former embracing flutes, guitars, harpsichords, musical boxes, and harps, and the latter copies of the best operas and standard classical music, brought good prices. There were pipes of every design and pattern, in which cost became paramount to utility, and in all cases the articles put up were disposed of at fabulous prices. Some curious and valuable articles in Dresden china, plate, and plated goods were subsequently disposed of to advantage, and the sale concluded with the wine department, some small lots of hock of 1818, a few dozens of the same wine "from Lord Byron's cellar," and a large quantity of various wines of later vintages, having gone off at large premiums.

* Moore mentions the disposition to melancholy which belonged to his temperament—the boundary of this world's pleasures—"to see nothing but 'clouds and darkness' beyond, was the doom, the anomalous doom, which a nature premature in all its passions and powers inflicted on Lord Byron."—*Op. cit.* p. 87.

posed to exhibit something aristocratic in its look and bearing; but nothing can be in worse taste—it is simply a vulgarity, if feigned, or a constitutional ailment, if genuine. At the best, it is nothing better than pyrrhonism, or universal doubt, such as that cultivated by Lucian, Lucretius, or Voltaire. It doubts everything, except the right of doubting; it almost doubts of its own being; and rushes headlong into pantheism to escape from unqualified Atheism. It philosophizes on this world and the next; and perceiving that it is impossible to uproot Christianity, it perplexes itself with lopping its boughs and twisting its twigs into every variety of shape, to suit the whim or fancy of the hour. No one dares face an eternity of nothingness. The vast void must be filled up with fiction or truth—truth with a day of judgment, or fiction without a hope.

From this dread abyss uprose Faust. Having nothing in common with the transcendental philosophy of Lucian, Montaigne, or Voltaire, Faust is an absolute sceptic. His thirst is universal knowledge—his drink an intoxicating spirituality. He ransacks nature, art, science, passion, the city, and the desert, to get at the grand arcanum of existence. He is not an alchemist foiled in transmuting a grain of dust into an atom of gold; he is much more than this, for he aims at bringing down the Almighty into his crucible. The end is Margaret, dishonour, grief, and woe; and in the grand finale, the scene darkens, hell yawns, and the curtain drops over a chasm of eternal night. Such is the climax of Orientalism in the persons of Faust and Mephistopheles, a twofold blasphemy that shivers to nothing the natural and supernatural order of events.

Nor is English literature free from the blight of this dismal mental obliquity. In one of the best stanzas of his *Elegy in the Churchyard*, Gray thus soliloquizes:—

“For who to dumb forgetfulness a prey,
This pleasing, anxious being e’er resign’d,
Left the warm precincts of the cheerful day,
Nor cast one longing, ling’ring look behind?”

It is evident these lines were paraphrased from the far nobler ones in *Paradise Lost*:—

“———— for who would lose,
Tho’ full of pain, this intellectual being,
Those thoughts that wander thro’ eternity,
To perish, rather swallow’d up and lost,
In the wide womb of uncreated night,
Devoid of sense and motion?”

It is true that these sentiments are put into the mouth of one of the fallen angels, but the relish with which they are quoted,

as they stand alone, betrays the kindred feeling with which they are read. In another stanza of his *Elegy*, Gray says:—

“Each in his narrow cell for ever laid,
The rude forefathers of the hamlet sleep.”

The words *sleep* and *for ever* may be excused on the plea of poetic licence, but taken as they are, the expression is unqualified, and they mean precisely what they say. There is more reality and hope of futurity in many an ode of Horace than in this; Virgil, in his sixth *Æneid*, allows of no sleep among the dead, either for good or evil; nor does Dante in his *Divina Commedia*. With each of these two last-named poets everything is in full action, whether it be penal torture, purgatorial expiation, or Elysian bliss. Nay, even in the *Iliad*, the opening lines are inexpressibly affecting, where the poet sends the souls of his heroes down to hell, while he leaves their bodies on earth a prey to dogs and all the birds of heaven;* nor less so, where it is said, that the battle shook the earth to its centre, and laid bare the astounded mansions of the dead, in that passage which Longinus extols to the utmost.† There is nothing in literature equally sublime, except in Isaiah, where the dead start from their thrones to hail the fallen monarch of Babylon.‡ But the most startling passage of this kind is that in the *Odyssey*, where the ghost of Achilles tells Ulysses he would willingly return to earth, and labour for ever as a slave and a hireling, rather than remain a prince in the realms beneath.§ Goethe, Byron, and Gray have no imagery similar to this in point of grandeur and solemnity of conception. Perhaps Homer derived his knowledge from some source much nearer to the fountain-head of primeval revelation. It was not till the age of Shakspeare that the Oriental apathy began to manifest itself in this country. It came forward with the dawn of civilization. Hamlet represents the *deadness* of a living soul. Nothing pleased him: everything palled upon his palate: the criminality of his own mother is suggested to him by an act of necromancy, or spiritual intercourse with the nether world; man displeased him much, and woman much more. He loathes his own existence, meditates self-slaughter, kills Polonius, turns Ophelia crazy by his ill-treatment of her, insults those about him, and dies in the midst of bloodshed and shame. Such is one of the most touching and approved dramas of the English stage.

We are almost tempted to imagine that the world has an inherent tendency to paganism—not, indeed, to the worship of

* *Iliad*, B. i. 3—5.

† *Iliad*, B. xx. 61. Longin. de Sublim. § ix.

‡ Isaiah xiv. 9.

§ *Odys.* B. xi. 482.

idols, but to the practice of those principles which were symbolized by idols. There can be no question of the worship of Venus in a way that we need not specify, since no one discredits it; nor is there any doubt of the worship of Bacchus, the god of wine and good cheer; nor of Pluto, the god of wealth. The cultus of these deities is fully recognised in our daily habits, and scrupulously carried out all over Europe. The pagans never paid higher veneration to their deities than we do to ours. The images of these vices are alone wanting to complete their ritual service; and the British nobleman, whoever he was, that facetiously bowed to the statue of Jupiter in the Vatican, was not far off from the truth when he said it was a matter of policy as well of politeness to put himself on good terms with the pagan deities, since no one knew how soon they would come into fashion again. What mean the statues of the great men which adorn our streets? are they not a species of hero-worship? Do they not represent an idea, or a set of ideas, and appeal to those sentiments which mainly actuate the modern world.* Did the idols of antiquity do more or less than this? Cæsar fell at the foot of Pompey's statue, the ideal of conquest; the merchants of Rome celebrated an annual festival to Hermes, the god of commerce; and the statue of *Divus*, or divine Augustus, had, as the superior emblem of power, its appropriate offerings. *Mutato nomine, de te fabula narratur.*

In the first ages of Christianity, it was the opinion of many writers on prophecy, that towards the end of time the world would return to idolatry, actual or potential, and that another Rome would resume the pre-eminence of the first, and surpass her ancient predecessor in wealth, power, splendour, and renown. They supposed that the luxuries of life and the art of living would be carried to the highest pitch; and St. Augustine, in contemplating this surprising course of events, pondered over the loss of Christian faith that was to attend this exalted worldly prosperity.† He asks himself whether it were possible that Christianity should ever perish from off the face of the earth; and yet within three centuries from his death, Mahomet blotted out the name of Christ from a large portion of Asia, the coast of Africa, and the west and east of Europe. Gibbon‡ relates the degradation of the Christians, and says that the light of the

* A statue is said to be inaugurated. What is an *inauguration*? The derivative of the word is *augur*, soothsayer. To inaugurate is to consecrate or devote something to a particular purpose. Inauguration, therefore, is an act of devotion, in this particular instance to a statue. *Dedicatio magnam religionem habet. Cicero dedomo sua.*

† *De Civitate Dei*, lib. xx. c. viii.

‡ *Gibbon*, c. 51, vol. v. 4th ed., p. 386.

Gospel, after a long and perfect establishment, was totally extinguished.*

The foregoing observations have been thrown out for the sake of promoting inquiry, as well as for the purpose of criticising the opinions of an age which excels so greatly in literature, arts, and arms; and it is a fair and legitimate subject of psychological investigation. The habits of thought peculiar to any given period are, if they are wrong, the fault of all or of none. They constitute the prevailing tone of society, and supply the motives of conduct and behaviour, both public and private. They form the atmosphere we breathe, without being aware of its noxious or beneficial effects; and we are taken by surprise when the magic wand of truth dissolves the charm, and shows us the nature of the elements floating around us, their evil and their good, their general bearing on mankind at large, and their specific action on ourselves. It is only by analysing the subject matter of the mind that we discover what the mind itself really is; and the literature of an epoch is the exponent of the progress or decline, the improvement or degeneracy, of a republic, an empire, or the world.

ART. VI.—SWEDENBORG'S DREAMS.

IN the whole range of modern biography there is no life of greater interest to the medico-psychologist than that of Emanuel Swedenborg. His writings constitute a splendid monument of the extraordinary intellectual powers, the untiring assiduity, and (apart from all considerations of the ultimate results to which this fervour led him) the lofty religious fervour of the man. As a philosopher he will always occupy a conspicuous and honourable position in the history of modern philosophy,† and as a theologian he gave birth to one of the most remarkable developments of Christianity in recent times. From the beginning, his religious feelings entered largely into his philosophical speculations, and constituted an essential portion of them. He held, indeed, that religion was necessary to the perfection of philosophy, and that philosophy divorced from religion was a dead letter. With him philosophy and revelation were fundamentally one and the same.

The merits of Swedenborg as a philosopher are too apt, perhaps, to be overlooked at a time when, as in the present day, his

* *Cornelius à Lapide*. Paris. 1859.

† Writing of Swedenborg's philosophy, Morell remarks that it is "perhaps the only attempt the world has seen (with the exception of the unsuccessful effort of Comte) as rising upwards to purely philosophical ideas from positive and concrete facts."—*History of Modern Philosophy*, vol. ii. p. 321.

opinions are known chiefly through the medium of those works of his for which he claimed the authority of divine revelation. "I have," he wrote in 1769, "been called to a holy office by the Lord Himself, who most graciously manifested Himself in person to me, His servant, in the year 1743, and then opened my sight into the spiritual world, and endowed me with the gift of conversing with spirits and angels, which has been continued to me to this day."*

This claim is by no means so obvious that it could be received without strong confirmatory evidence. Now many think that this is afforded by the intrinsic character of the so-called revelations made to Swedenborg and recorded by him, and their faith in this view is sufficiently evidenced by the existence of a distinct branch of the Christian Church, founded upon the doctrines taught by him. On the other hand, it is contended that there is nothing in the evidence derived from the supposed divinely illumined writings of Swedenborg which might not have pre-existed in his mind, and which is not consistent with, and a possible consequence of, his habits of thought. Hence it is argued, that the hypothesis of spiritual prompting is neither necessary nor probable, and that Swedenborg had, unfortunately, in common with many mystics, become subject to hallucinations which were characteristic of his dominant ideas and feelings. This is the simplest and most natural conclusion, and it derives strong confirmation, if it is not actually demonstrated, by a work of rare interest which has recently come to light.

For the subsequent account of this work, and extracts from it, we are indebted to Dr. William Daniel Moore, of Dublin, M.R.I.A., Honorary Member of the Swedish and Norwegian Medical Societies, to whose distinguished talents as a linguist the medical profession of this country has been so often and so greatly indebted.

In 1858, there was discovered among the papers of a Professor Scheringsson, of Westerås, who had died in 1849, and among whose literary remains the document had been overlooked for nearly ten years, a singularly interesting and previously unknown manuscript of Swedenborg's. In what manner this manuscript had come into the possession of Professor Scheringsson, how long it had been in his hands, and what motives could have induced him to keep its existence a profound secret, are questions concerning which no information has been ascertained. No doubt would appear to be entertained as to the genuineness of the manuscript, which is a species of "Spiritual Diary" of the author for the year 1744, written in old Swedish, and it was

* Answer to a letter from a Friend, prefacing *A Treatise concerning Heaven and its Wonders, and also concerning Hell*. Lond., 1817.

purchased for, and is now deposited in, the Royal Library of Stockholm.

In 1860 this "Diary" was published under the following title—*Swedenborg's Drömmar 1744 jemte andra hans anteckningar. Efter original-handskrifter.* Ita provisum est a Domino, ut phantasiæ iis appareant prorsus sicut realiter forent.—*Diarium Spirituale*, 4360 (Stockholm, J. och A. Riis. 1860. 8vo., pp. 94, Swedenborg's Dreams, 1744, with other notes of the Author. From original MSS.). Appended to the pamphlet is an introduction by the Editors, entitled, "*Reflexioner öfver de nyligen uppdagade Swedenborg's Drömmar 1744*" (Reflections on the recently discovered Dreams of Swedenborg, 1744, pp. xxiv.).

The "Dreams" would appear to have been noted down for the purpose of refreshing the author's memory as to his past psychical and spiritual condition, and they were most probably intended for no other eye than his own. For convenience of description the dreams recorded may be divided into six categories—

1. The *common-place*, comprising by far the greater number. From many of these, although they differ but little, if at all, in character from the strange ideas which float through the minds of most people in their sleeping moments, the author derives indications of his own sinfulness and helplessness, of the mercy of God exhibited towards him, of forgiveness of sins, and acceptance with the Deity.

2. The *amatory*. Some of this class are lascivious and obscene. They are generally followed by expressions of repentance and of a "sense of forgiveness of sins," &c.

3. The *horrible*, or those characterized by hideous apparitions. Several of these are evidently of the nature of nightmare.

4. The *ambitious*, or those in which the dreamer converses with kings and emperors.

5. The *penitential* or *devotional*.

6. The *ecstatical*, or those in which the author supposes he has been favoured with manifestations of the Divine presence.

Before citing any illustrations of the 'dreams,' it is necessary to premise that it is by no means an easy task at all times to ascertain the precise meaning of the old Swedish in which Swedenborg has noted them. Not only does the language itself appear to have undergone a considerable change within the past century, but an additional source of obscurity is found, in the mystical signification attached to the facts recorded. "A certain class of so-called cultivated people," say the editors, and, it must be added, apologists of the "Dreams," in explanation of the somewhat corrupt language in which they are written, and of their occasional obscenity, "little knows what change the Swedish tongue has undergone within the last century, and still less do such people understand the imagery, the sublimely symbolical forms

through which a spiritual world, by means of dreams and visions, under certain circumstances and for definite objects, reveals itself and condescends to a natural world." When a sentence is doubtful, or, so far as we can discover, unmeaning, we have placed it within brackets.

The first detailed dream bears date 24 × 25* March, 1744: previously to this are some notes commencing on the day of Swedenborg's departure from Stockholm, the 21st July, 1743. These notes contain certain heads of dreams apparently taken down before Swedenborg began to write out his dreams at length, and they run thus—

"1. in youth and the Gustavian family.

"2. in Venice about the beautiful palace.

"3. in Sweden, about heaven's white cloud.

"4. in Leipsic, about him who lay in boiling hot water.

"5. about him who tumbled down with the chain into the abyss.

"6. about the king, who gave so richly in a cottager's hut.

"7. about the servant who wished I should depart.

"8. about my enjoyments in the night.

"— wondered in myself that I had nothing remaining to do for my own honour, so that I found feeling thereof.

"— [that nothing was borne (? portrad) before the sex, I had been all my days.]

"9. how I had been in extasibus vigilibus almost the whole time.

"10. how I set myself against the spirit.

"—and how I then thought thereon, but found afterwards that it was folly, without life and connexion.

"—[and that thus a quantity in what I have written must be, as I have not in the degree forsaken the spirit's power, for the faults are mine own, but the truths are not mine.]

"— I sometimes got impatient and thought, that I seemed as though I would presume when it went not so easy as I wished, after I did nothing for mine own sake; found my unworthiness less, and thanked for grace.

"11. how I found that after I came to the Hague the propensity and self-love of my work was passed away, this I myself wondered at.

"— how my inclination for woman so hastily terminated, which had been my ruling passion [hufvudpassion.]

"— how I had the whole time the best sleep at night, which was more than kind.

"— how my ecstasies before and after sleep.

"— my clear thoughts on matters.

"How I set myself against the Holy Spirit's power, and what

* This mark (×) interposed between the dates signifies *night*.

happened thereupon, how I saw hideous apparitions; without life, horribly involved, and therein had to do with an animal which attacked me and not the child.

"I seemed to lie on a hill, under which was an abyss; there were knobs; I lay there, would help myself up, was held in a knob, without foothold; an abyss was under me; signifies that I would help myself from the abyss, which was not possible.

"How a woman lay down at my side, so when I was awake I would know what it was; she spoke gently, but said she is pure, but I smell ill, which was my guardian angel, as I believe, for then the temptation began!"

Of the detailed dreams, as well as of the psychical condition of Swedenborg at the time when they occurred, the following quotations, we trust, will convey a tolerably accurate conception:—

1744, March 24 × 25—"Spoke with our successor in Sweden, who was turned into a woman, yet was also familiar, afterwards with Carl Brokman. I know not what this signifies if not from the following.

"Came into a magnificent chamber, and spoke with a woman, who was the governess; she would inform me of something; then came the queen in and passed through into another chamber; she seemed to have been the same who represented our successor. I went out, for I was very meanly clad—having come from my journey—a long old surtout, without hat or periwig, I wondered that she deigned to come after me; she told me that one had given her mistress all the jewels, but she got them back by saying that he had not given the best; then she threw away the jewels; she told me to go in again, but I excused myself because I was so ill-clad, and had no periwig, I should first go home; she said it did not signify: it concerns that I should then write and begin the epilogue of the second part, [this I would sit down to, but it was not necessary; which also happened; what she stated about the jewels, are truths which are disclosed, but have been taken back, because she was angry not to get all; I afterwards saw the jewels in her hands, and a great ruby among them.]" (p. 5.)

"5 × 6, April, 1744—Easter-day was the 5th April: when I went to God's table, the temptation still continued, most of the afternoon till six o'clock, yet nothing certain; it was an anguish as if one were condemned, and in hell, yet the hope, which the Holy Spirit gave, was always strong, as Paul says, Rom. v. 5, the devil was given power with various thoughts to make the inner man uneasy. Whitsunday after Communion I was inwardly cheerful, but still outwardly sad; the temptation came in the afternoon, in a quite different manner, but strong; though I was assured that I had obtained forgiveness of sins, still I could not direct my flying thoughts, nor avoid expressing something against my better reason, which was the devil's, through per-

mission ; prayer alleviated them, as also God's word, faith was there intact, but confidence and love seemed to be away. I lay down at 9, the temptation continued with trembling until half-past 10 o'clock ; then I fell into a sleep, in which all my temptation was represented, how * * * * sought in various modes to get me on his side, to be of his party (luxury, riches, vanity), but he could not. I was still more obstinate on the subject, when he manifested disdain towards me ; afterwards I was together with a serpent, dark grey, which lay, and was B.'s dog. I struck many blows with a club after him, could never hit him on the head ; it was fruitless ; he would bite me, but could not ; I took him by his mouth, he could not bite me, nor could I do him much harm ; at length I took him by the jaws, and he squeezed hard, and by the nose ; I squeezed it that it broke out, like poison ; said, that the dog did not belong to me, yet, as he would bite me, I must chastise him ; thereupon he seemed to say that he had not got me to say a word with him, I wrangled so with him. When I awoke, the word I said was, Hold thy tongue ; hence may be seen, without further explanation, of what nature the temptation was ; but on the other hand, how great God's grace was, through the merit of Christ, and the operation of the Holy Spirit, to which be glory for ever and ever. I immediately thought how great the Lord's grace is, which imputes to us that we resist temptation, which nevertheless is only God's grace and operation, is his, and not ours, and overlooks what infirmities we have had therewith, which yet must be manifold, as also what great glory our Lord gives, after a short period of adversity." (pp. 8, 9.)

Swedenborg's "first revelation," according to the "Dreams," occurred at the Hague, 6 × 7 April, 1744, and not in 1743, as stated in the letter quoted at the beginning of this article, and is thus described :—

"In the evening I fell into another sort of temptation, namely, between 8 and 9 o'clock, when I read God's miracles, performed through Moses, I thought that somewhat of my understanding was mixed up therewith, that I could not have the strong faith I ought ; I believed and did not believe, thought that therefore God and the angels manifested themselves to shepherds and not to the philosopher who appeals to his reason, asking why God made use of the wind to bring up the locusts, why he hardened Pharaoh. I looked at the fire, and said within myself, so should I also not believe that the fire exists, as the outward senses are more fallacious than what God says, who is ipsa veritas, I ought to believe this rather than myself. With many such thoughts I passed an hour or an hour and a half, and smiled in my mind at the tempter. It is to be observed that the same day I went to Delft, and the whole day had the grace to be in deep spiritual

thought, as deep and beautiful as I ever had, and the whole day, which was the Spirit's work.

"At 10 o'clock I lay down in bed, and was somewhat better; half an hour after I heard a clamour under my head, I thought that then the tempter went away: immediately there came over me a rigor so strong from the head and the whole body, with some din, and this several times; I found that something holy was over me; I thereupon fell asleep, and at about 12, 1 or 2 o'clock in the night, there came over me so strong a shivering from head to foot, with a din, as if many winds rushed together, which shook me, was indescribable, and prostrated me upon my face. Then while I was prostrated I was in a moment quite awake, and saw that I was cast down, and wondered what it meant. And I spoke as if I was awake, but found that the word was put into my mouth, and I [said], Omnipotent Jesus Christ, as of thy great grace Thou condescendest to come to so great a sinner, make me worthy of this grace. I held my hands together and prayed, and then came a hand, which squeezed my hands hard; immediately thereupon I continued my prayer, and said, that Thou hast promised to pardon all sinners, Thou canst not but keep thy word; at the same time I sat in his lap and saw him face to face; it was a face of holy look, such as cannot be described, and smiling, such as I believe his face was while He lived. He spoke to me, and asked whether I had a bill of health; I answered, Lord, That thou knowest better than I. Well, do so, said he. That is, I thought, Love me really, or do what thou hast promised. God give me the grace thereto. I found that it depended not on my own strength, woke with rigors: I again came into such a state that I was, in thought, neither sleeping nor waking. I thought, what can it be? Is it Christ, God's Son I have seen? but it is sin to doubt it. But as it is commanded that we shall try the spirits, I thought, after all, and found from what passed the night before, that I was purified and preserved, and so prepared for it, as also that I fell upon my face, and the word I spoke, and the prayer came not of myself, but the word was put into my mouth, yet that I spoke, and that all was holy: so that I found that it was God's Son himself, who came down with such a din, and who prostrated me on the ground of himself, and made the prayer, and so said it was Jesus himself. I prayed for pardon, that I should so long have doubted it, and also that it came into my thought to desire a miracle; this I found was improper. Thereupon I fell to prayer, and prayed only for pardon; more I could not, but afterwards I added, and prayed that I might obtain love, which is Jesus Christ's work and not mine. However, rigors often passed over me." (p. 11.)

"To forget nothing, it also came into my thoughts that the Holy Spirit would show me to Jesus, and present me to Him as

a work He has so prepared, and that I ought not to attribute anything to myself, but all is his, although He, of grace, attributes the same to us.

"So I sang the psalm I then chose; Jesus is my best Friend, n. 245.

"This I have now learned in spiritual matters, that there is nothing else than to humble one's self, and not to desire anything else, and that with all humility, than the grace of Christ; I added of myself, to obtain love; but this is arrogant, for when one has God's grace he places himself in Christ's hands; and does according to his will: man is happiest when he is in God's grace; I had with most humble prayer to supplicate for forgiveness before my conscience could be in peace, for I was still in temptation before that took place; the Holy Spirit taught me this, but in my stupidity I overlooked humility, which is the foundation of all." (p. 13.)

"April 15 x 16.—I thought I climbed by a ladder out of a great abyss; after me came other women whom I knew; I stood still and frightened them on purpose, went up, struck against a green sward, and lay down: the others came after I saluted them, they were women, they lay down beside me, one young and one a little older. I kissed the hands of both, and knew not which I should love. (p. 29.)

After the foregoing, April 17 x 18 brings its "horrible dreams, how the executioner spitted the heads he cut off, and laid one after the other in an empty oven which never became full: he said it was his food; he (sic) was a large woman, mean, had a little girl with him [or her.]

"Afterwards how the Devil led me into several abysses and bound me, I remember not all. I was cast everywhere bound into hell.

"How a great procession was formed, from which I was excluded; and that I should have come from it; but I endeavoured to come thither, sat down there, but they advised me to go from it. I went; yet I had another room to see it from, which had not yet come. Yet am I certain that God shows mercy and pity to all poor sinners, who will repent, and with steadfast faith fly to his incomprehensible compassion, and to the merits of our Saviour Jesus Christ. So I feel assured of his grace, and leave myself in his protection, because I believe certainly that I have obtained forgiveness of sins; which is my consolation, which may God, for Jesus Christ's sake, strengthen." (p. 31.)

"I obtained peace, God strengthen me therein, for it his work, and so much the less mine, as my thoughts, even the best of them, rather disturb than promote it. Then one smiles in himself, both when he thinks contrary to it, as when he will confirm with

his understanding what he believes. Therefore it is a higher degree, I know not if it is the highest, when a man acquires grace, not to mix up his understanding in matters of faith, (although it would appear that our Lord in certain cases admits that reflexion is to be preferred to authority in what concerns the understanding;) 'blessed are they who believe and have not seen.' This I have clearly written in prologue n. 21, 22; but yet could not of myself remember or arrive at it, unless God's grace, without my consciousness, had effected it, as I subsequently found from the effect itself and the change in all my inner being, for it is God's grace and operation, to which be glory for ever; for I hence see how difficult it is for the learned, compared with the unlearned, to arrive at this faith, and so to overcome themselves, as to smile at themselves; for admiration of one's own understanding must first of all be subdued and cast down; which is God's work and not man's. Likewise is it God's work to maintain one therein. This faith is therefore distinct from our understanding, and is above it. This is pure faith, the other is impure, so long as it is mixed up with our understanding; we ought to take our understanding captive under obedience to faith. That we ought to believe therefore, hath he said who is one God over all, truth itself. This is what seems to be meant by the saying, that we ought to be as children. Much of what I have seen agrees herewith, and perhaps this also, that so many heads were cut off and cast into the oven, which was the Devil's food."

"And that confirmatives darken faith, is seen from the fact that the understanding does not reach beyond probabilities, wherein there is always as it were *probatio majoris* or *minoris*, for confirmatives of one's own understanding are always subject to doubt, which obscures the light of faith. This faith is solely God's gift, which one obtains, if he lives according to God's commandments, and assiduously prays for it." (p. 32.)

Speaking in another place of conflict with temptation, he says, "I may liken it to a pair of scales, in one lie our will and evil nature, in the other God's power, which our Lord arranges so in temptation, that he allows it sometimes to come to an equilibrium, but so soon as it is about to weigh down to the side, he helps it up; thus I speak in worldly language, whence it follows that our power is so small that it drags all down and is rather opposite than auxiliary to the Spirit's power; and thus that it is only our Lord's work which he so arranges." (p. 15.)

Though a great dreamer, Swedenborg seems to have been a good sleeper, for he tells us that he "slept for an hour and an half, although during the night I had slept for more than ten hours. I have by God's grace had supernatural sleep, as also during the whole half year."

"I held my hands together; on awaking I thought they were pressed together by a hand or finger, which with God's help signifies that our Lord heard my prayers."

"This day I was in the strongest temptation, so that when I thought upon Jesus Christ godless thoughts forthwith came into my mind, which I could not get the better of: in my opinion, I beat myself, but can acknowledge that I never was in so healthy a mood as this day, and was not in the least timorous or grieved as the other days, although the temptation was strongest, because our Lord gave me the firm belief and confidence that he helps me for Jesus Christ's sake and his promise, so that I then experienced what the efficacy of faith is." (p. 34.)

But, alas! the flesh soon again gets the better of the spirit, for the private records of 23 × 24 April in Leyden, and of 28 × 29 at the Hague, bear so strong a resemblance to some objectionable passages in Horace and Juvenal, that we must omit much of them.

"23 × 24 [April, 1744], in Leyden. It seemed that I was fighting with a woman in flight, who drove me into the sea and up again; at length I struck her with the plate on the forehead, as hard as could be, and pinched her face, so that she seemed to be overcome; it was my afflictions and my contest with my thoughts which I overcame.

"— It seemed to be said, *interiorescit, integratur*, which signifies that I am inwardly cleansed by my afflictions.

"— Afterwards something holy was dictated to me the entire night, which ended with *sacrarium et sanctuarium*: I found myself lying in bed with one [a female], who said, If thou hadst not said *sanctuarium*, we should do." [The sentence following is highly obscene.]

"There was one waiting at the bedside, but she went away first.

"This signifies the most extreme love for sanctity, for all love has its origin thence, is a series; in the body it is actually in *projectione seminis*, when the whole seed (*saten* [?]) is there and pure, it signifies the love for wisdom. The former was for truth; yet as there was one listening thereto and nothing was done until she was gone away, it signifies that silence ought to be observed respecting it, and none to hear of it, for to the worldly understanding it is impure, though of itself pure.

"Afterwards I slept a little, and it seemed to me that oil mixed with mustard still flowed, which seems to be my future life, and which shows there is enjoyment mixed with some adversity, or that it signifies a medicine for me.

"This took place at Leyden, in the morning of the 24th of April.

"28 × 29 [April, 1744.] The night before I thought I saw King

Charles XII., to whom I formerly dedicated my book; but I thought now that he was risen from the dead, and that I went out, and would now dedicate to him, as it were, another.

"I went by a way, it was a cross road I was directed to go up, so I went, but thought there were only some days left, so I went back into the plain; there was much people, I would go out, and was very much pressed.

"I gave some fruits to a gardener to sell; he sold them, and brought me back two Carolines, but said that he had kept for himself thirteen dollars; this I did not care for." [The sentence following is most filthy and obscene.]

"All this shows, I think, that I ought to employ my remaining time on what is higher, and not in writing on worldly things, which are far inferior, but on what concerns the very centre of all, and what relates to Christ. God be so gracious and instruct me further what my duty is, for I am still in some darkness as to whither I ought to turn myself.

"d. 1 x 2 July," describing a manifestation he says: "This was in a vision, when I was neither awake nor asleep, for I had all my thoughts collected; *it was the inner man separated from the outer*, which perceived it: when I was quite awake, similar shiverings came several times over me. This must have been a holy angel, for I was not cast upon my face; what that signifies, our Lord knows best; it seemed before to be said to me, that I should have something for my obedience or something else. God's grace was manifested to the inner and the outer man in me; to God alone be praise and glory."

6 x 7 October, he observes, "I thought and perceived that all love to anything whatever, as to the work I have in hand, if we love it in itself, and not merely as a medium to the only true love which is to God and Jesus Christ, is a meretricious love, and is therefore always likened to whoredom in God's word; this is also what has happened to myself; but when our love to God occupies the first place, we have no other love besides than what promotes our love to God." (p. 55.)

The foregoing extracts will probably suffice to convey a pretty accurate notion of Swedenborg's psychical state, at the time when his visions commenced. It would seem that in 1743—1744, Swedenborg had become subject to frequent dreams, contemporaneously with a marked, and, to him, inexplicable change in his ordinary mental state, if we understand aright his brief observation at the commencement of the diary, that "the propensity and self-love of his work was passed away, which he himself wondered at;" and that his "inclination for women so hastily terminated, which had been his ruling passion."

At the first he appears to have been quite conscious of the nature and personal origin of his dreams, as well as of their being governed by his dominant thoughts ; but in accordance, it may be said, with his customary habits of thinking, he regarded them in a mystical sense, and applied them to the subjects he wrote on, or studied, or to his religious state as a sinner. Yielding to, as it were, and fostering thus his dreams, they presently became habitual to him, and occasionally passed into the state of actual visions, that is to say of waking dreams,—*hallucinations*. There is nothing whatever to show that the hallucinations of his waking moments were not of essentially the same character as the hallucinations he experienced when asleep. The former, indeed, were the culmination of the same mental and sensorial changes which had led to the latter, and their manifestation was coincident with a marked change in Swedenborg's power of thinking. The augmentation of the sensorial disturbance to the pitch of hallucination in waking moments was, in fact, accompanied with indications of mental disorder.

As in sleep the mind yields implicit belief to the sensorial changes which occur in dreaming, so we find Swedenborg yielding without question implicit belief to the reality of his waking visions. Both the sensorial and mental characteristics of dreaming had passed into his waking moments. He no longer distinguished the true nature of his dreams as dreams, and their intimate dependence upon his dominant thoughts, but thenceforth (unconscious of the vast gulf intervening between the premises and the corollary) he looked upon them as divine revelations ; and into this category he swept without reserve all his dreams, even the commonplace, the ambitious, the horrible, and the erotic.

The erotic dreams which, if we err not, have now for the first time come to light, seem to us to prove most conclusively that Swedenborg's mental faculties were, at this period of his life, more or less disturbed, and that he suffered from hallucinations in the strictly scientific sense of the term. His amatory propensities, as well as religious feelings, determined the form of certain of his dreams, and these, in some instances, assumed a highly obscene character. Now, when we find these dreams deliberately recorded from point to point, even in their most filthy details, and put upon the same level in respect to their spiritual significance as the holiest dreams, the conclusion as to the mental state of the writer is obvious, particularly when, as in Swedenborg's case (who was a celibate, by the way,) he had been a man of pure, unblameable, and religious life.

Swedenborg's account of his strong erotic propensities, and the manifestation of these in his dreams, throws a significant light

upon his works on "Conjugal Love," and "The Pleasures of Insanity; or, Scortatory Love," as well as upon passages in other of his theological works.

To say that Swedenborg was a lunatic, is to use a term which conveys to a vast majority of persons the notion of entire lack of reason, and so far, as applied to Swedenborg, would give rise to a false impression. Swedenborg was subject to hallucinations, and these hallucinations influenced his thoughts and governed his conduct for many years. Hallucinations which are not recognised as such are incompatible with sound reason; but it does not follow that this defect of reason should be manifested except in connexion with the hallucinations with which it is allied, or the train of thought immediately dependent upon or arising out of the hallucinations.*

It is but just to add that the Editors of the "Dreams" consider that the additional insight afforded by this newly discovered diary into Swedenborg's mental state when he began to see visions and dream dreams, in nowise detracts from the justness of his claim to their supernatural character.† "Exhibiting," they observe, "the transition period in Swedenborg's life, the change from the worldly to the spiritual, these notes are of great value in enabling us to judge of his psychical condition, which they represent to us as extremely agitated, and into which we can thus look more deeply than was before possible." p. vi. They next inquire, whether those who originally made known these dreams are to be considered as friends or enemies of Swedenborg, and appear to incline to the former theory, although, "on the other

* "Ces hommes," writes Lelut, of men like Swedenborg, "étaient doués d'une sensibilité, d'une imagination tellement ardente, et les impulsions intérieures qui les poussaient vers un but nécessité par les besoins et les croyances de l'époque, croyances et besoins qu'ils partageaient plus que personne et dont ils étaient l'expression vivante;* ces impulsions, dis-je; étaient tellement fortes, que les idées auxquelles elles donnaient lieu ne tardaient pas à se convertir en images sensibles, dont ils n'avaient aucun moyen d'apprécier le manque d'objets dans le monde extérieur, et ils se conduisaient en vertu de ces images, comme dans les passions nous nous conduisons en vertu d'impressions presque aussi vives, et qui nous ôtent momentanément tout moyen de comparaison et de choix. Si l'on veut, ce n'étaient pas des fous; mais, c'étaient des hallucinés, comme il n'y en a plus et comme il ne peut plus y en avoir, des hallucinés dont les visions pourraient être appelées les visions de la raison."—*Récherche des Analogies de la Folie et la Raison*.

† We believe that English, French, and German translations of the "Dreams" exist, but the publication of the English translation (prepared by the Swedenborg Society) has been suppressed, and we have been unable to procure copies of the other translations, whether from their having also been suppressed, or from the impossibility or difficulty of getting them in the ordinary course of trade, we cannot say.

* See Cousin on Swedenborg, *Cours de l'Hist. de la Philos. Mod.*, Lect. xii.

hand, it may seem that he who takes away the wall of a man's bedroom and exhibits him in his nightdress, when he believes himself alone with the God he worships, and before whom he pours forth the inmost thoughts of his heart with earnest supplications for help in his conflicts with an inherited nature, and all the assaults which every sincere Christian understands from the experience of himself and others, can scarcely be the friend of the person thus exposed." p. vii.

"What, then," they ask, "properly is this book, or what does it contain?"

"It is," say these, his apologists, "a journal, or rather a *night-book*, in which Swedenborg noted down his dreams at a time when he seems to have been in a state of inward temptations and conflicts, through which his spirit passed as a sort of fermentation for purification and preparation for his important commission, to receive from the God of heaven and to bring down to the people of the earth, the sublime and pregnant truths which should, according to the prophecies of the apocalypse, at that time be announced and disseminated. Of such a condition the "natural man, which receiveth not the things of the Spirit of God," has no idea. Therefore he who is only superficially educated, who knows not, much less walks in, the way of the new birth, where the soul of man is transformed from a corrupt to an ennobled being, is easily led to pass the doom of condemnation on this work. By such a person it will be, even with reference to its orthography, regarded as the production of an ignorant fool, who has not learned to write his own mother tongue; and who has at one time made subjects of scruples, desires which most other men consider quite natural, and do not think of overcoming, but rather hasten to satisfy; and at another, has seen in these dreams meanings and indications which could not have any sort of reality, and were therefore mere products of the imagination. A certain class of so-called cultivated people little knows what change the Swedish tongue has undergone within the last century, and still less do such people understand the imagery, the sublimely symbolical forms through which a spiritual world, by means of dreams and visions, under certain circumstances and for definite objects, reveals itself and condescends to a natural world. But not merely the superficially cultivated, but likewise those, who in our days correspond to the scribes and pharisees of the earliest christian epoch, misunderstand and misinterpret a writing like this. Therefore it was stated in a letter from Upsala, written shortly before this book was printed: 'now among Swedenborg's opponents, a manuscript is triumphantly spoken of, which is said to have been found in Westerås, and from which they believe it appears that his visions proceeded from sensual

passions, because he acknowledges therein that he has had severe conflicts of this kind !' But they forget, in drawing such conclusions, that it is through conflicts that victories are won. There is in the entire of this book no certain proof that in these conflicts he *fell*. He speaks, indeed, of himself as a great sinner, for he knows that sin lies even in the desire of anything which removes man from God and heaven ; he reproaches himself, and therefore the least thought of self-contentment, or of his own worth, which many another would believe to be more praiseworthy than censurable, and would never think of disapproving in himself. But Swedenborg wishes that the Lord alone should be praised and honoured for all. Therefore, when he explains his own dreams as reprehending what has taken place in his thoughts, he speaks of his unworthiness of all the grace which is shown him, and prays with the deepest humility to be able to abandon himself and everything that is his, in order completely to belong to the Lord alone, and to be unboundedly and without any reserve submitted to his will," p. ix.

We may be wrong in our estimate of the nature of Swedenborg's dreams and visions : but before admitting his claims to divine illumination, we think that confirmatory evidence at least equal to that upon which our faith in the illumination, inspiration, or Divine guidance, of those holy men who wrote the Sacred Scriptures is founded, should be forthcoming.

ART. VII.—ON THE EDUCATIONAL TREATMENT OF CRETINISM.

BY J. MUNDY, M.D., OF MORAVIA.*

IT is well known that the fundamental principle in all attempts to ameliorate the mental condition of cretins is, by judicious efforts, to work on the mind. The question, however, as to whether or not cretinism has ever been influenced by mental impressions, is a subject which has been much neglected in medical discussions. We take it for granted that our readers

* In the article on Gheel, from the pen of Dr. Mundy, in the July number of this journal, the author's name, and several other proper names were unfortunately spelled incorrectly. The errors rest, except a misprint or two, with the translator to whom Dr. Mundy had intrusted his manuscript, the author being unavoidably prevented from revising either the translation or the press. The following are the corrections requisite to be made in the paper :—For Sachsenlerge, read *Sachsenberge* ; Bull, *Orez*, *Bull-Ogez* ; Pjados, *Pujados* ; Francis, *Galt*, *Francis Scott* ; Veith, *Feith* ; Grünty, *Grüntz* ; Bulcken, *Bulckens*.

are acquainted with the best historical information on cretinism in all countries; we shall therefore only incidentally touch on the most recent results of the pathological anatomy and physiology of cretinism. It appears to us that the therapeutics of cretinism have as yet obtained but a doubtful support from the statistics of a medically directed education; it is therefore our intention to examine in this article the value of the results so attained. Therapeutics have only a positive value in science when they furnish practical information on progress and cure. Has medical instruction, however, yielded such a result in cretinism? We are inclined absolutely to deny the question of cures, and we ask our readers to examine our views in support of this assertion. Twenty years ago the idea of tending and educating cretins had occurred to but a few individuals in any country. Attempts to cure cretins have only been made in recent times, and these attempts have at last proved *that a cure of this cerebro-spinal disorder is impossible, and that a certain degree of amelioration only is attainable by a system of education under medical supervision.* Have the asserters of the possibility of cure under such circumstances given us sufficient practical proofs of their therapeutics? We find certainly, asserted proofs here and there in books and reviews, but in life and in reality there are none. If men are called upon to cure a disease, they must first understand its etiological diagnosis; but of cretinism and its origin we have not even as yet a correct definition. The etiology of the evil is very vague; the diagnosis is, at the beginning of this disease, very difficult, and in its development without practical value; and medical therapeutics furnish us with nothing to stop its progress, and the system of education pursued presents us with results of but small value. When Dr. Guggenbühl founded his institution, with but scanty means, about fifteen years ago, on the Abendberg, at Interlachen, in Switzerland, for the purpose of nursing and curing cretins, our medical colleagues, as well as the general public of Europe, were charmed with the beautiful but visionary scheme. Many years were requisite before an earnest and temperate examination could prove its futility. What has, we ask, the first founder of this institution done for science and humanity in his especial field? He has done this—First, he has continually kept scientific interest alive to this subject: by which, secondly, several Governments have been incited to establish special asylums for cretins: and thirdly, he has the merit of having been the first who has applied a system of medically directed education to the therapeutics of cretinism. These indisputable merits of Dr. Guggenbühl will, we hope, be always borne in mind by his antagonists in their criticisms on him. The following facts, however, speak against his system:—

1. His asylum* is injudiciously constructed and arranged, especially the new portions of the buildings; appliances for warmth and ventilation, particularly in the dormitories, are almost altogether wanting; and the supply of water is scanty and bad.

2. His general treatment of the patients is arbitrary, and the dietary is unsatisfactory. In the absence of Dr. Guggenbühl, the superintendent and only physician of the asylum (and he is often away an entire month in the winter), no efficient substitute is provided, the patients being left under the charge of a sickly Frenchwoman.

3. The instruction of the children is not worthy of the name of system, and there is a want of those educational appliances without which any good practical result from an institution of this kind cannot be looked for.

During the whole period that Dr. Guggenbühl has directed this asylum, he has never kept even a simple register of cases! The few pamphlets and articles which he has published on his institution have therefore never furnished such positive data and statistical results as science has a right strictly to demand. We must take care not to confound a few *Recitals of Diseases*, which he relates, with the history of cases of cretinism, which he does not furnish. Dr. Guggenbühl has ignored all branches of purely medical detail, and has furnished us with no new statistics of any kind. Dr. Guggenbühl asserts that he has trained many of his patients to become *useful members of society* by his educational system. We have visited two of his patients so designated, but found, unfortunately, that they are still perfect idiots, incapable of making themselves useful, even in the most mechanical occupations of common life. We vainly asked for positive dates respecting other patients reported as progressing towards cure (so weit gebessert). The director of the institution in the Abendberg, has recently applied to the medical faculty and scientific academies of Paris and Petersburg, to compile a statistical report of cretinism of all countries, and to invite discussion on the subject, and these two countries have willingly lent their assistance on this appeal. In Petersburg, as well as in Paris, especial committees have been formed for the purpose of occupying themselves exclusively with this business. Men of the highest renown and talent have become members of this commission in France—such as Brown-Séguard—whilst the Imperial Academy of Medicine at St. Petersburg published, last year, a report of Professor Dr. von Baer on the statistics of cretinism, which we recommend to the especial notice of our readers. From France we shortly expect the report of the commission, which we think will be doubly

* We visited the Abendberg in June, 1861.

interesting, as the revival of the cretin question has been greatly advanced since the annexation of Savoy to France. In addition to this, the Emperor Napoleon III., in strict imitation of his illustrious uncle, had, during his stay at Chambéry, in Savoy, last year, a long interview with Parchappe and Niépce, of Grenoble, on cretinism and its cure. In consequence of this imperial conference, a new prize work on this subject has been proposed, and 400,000 francs have been granted to rebuild the lunatic asylum at Bassens, near Chambéry, in which there are to be 100 new beds for cretins. The same thing was done by Napoleon I. when, in 1811, he conferred on this subject with Daquin at Chambéry, and with Larrey at Paris. A similar prize question was published last year by the German Society for "Psychiatrie und gerichtliche Psychologie;" it was to this effect:—

"Of what good have asylums as yet been to idiotic cretin children? What expectations for the future do they raise? And what arrangements are necessary to increase their utility?"

It is interesting to learn that the only competitor for this prize adopted as his motto the proverb "Nur eitler Hochmuth bricht den Stab über sie;" that he took back his competition work, and that the society has inquired, through the *Correspondenzblatt* (secretary, Dr. Erlenmayer, at Berndorff, near Coblenz), of its members, whether they desire the original question to stand open for competition for 1862. A great deal has recently been written on the anatomy and physiology of idiotism by Greding, Chiarugi, Romberg, Webster, Engel, Leubuscher, Meier, Ahrens, Kölliker, and finally Virchow, who wrote especially on cretinism. We also possess further valuable information, on this subject, from the pen of Akermann, the brothers Wentzel, Daquin, Ferrûs, Niépce, and Forbes Winslow. We must not omit to mention Rokitansky and Schroeder van der Kolk, those two great men who are not only an honour to Austria and Holland, but also an ornament to the whole world. Valuable contributions to this knowledge have been furnished by Dr. Skae, of Edinburgh, and Dr. Sankey, at Hanwell, who weighed the brains of patients.* And there have been, also, rapid strides in its administrative department. We recall to the memory of our readers the official reports on cretinism issued by the Sardinian and French doctors. In Austria Dr. F. V. Zillner has lately published a very interesting work on idiotic diseases (Jena, 1860). The great experience of this active physician in the Saltzburg district furnishes us with exhaustive proofs of his practical investigations. Dr. Marcher has this year published a handbook of the topography and

* We particularly call the attention of our readers to the distinguished work of Dr. Morel, *Traité des Dégénérescences*.

statistics of the Duchy of Styria, in which he has especially devoted himself to cretinism. It is well known that in Austria, and chiefly in the Salzkammergut and Styria, the so-called endemic cretinism is very prevalent. The experience of these physicians, who are in the daily habit of treating such patients, is of considerable moment. As early as 1855 the meritorious Dr. Köstl, now director of a lunatic asylum at Prague, published a pamphlet on cretinism, as being a proper subject for public care; this was forwarded to the Austrian home minister, Dr. Bach, who placed this, with other memorials, *ad acta*. The two prizes, which were awarded by the ministry, in 1859, for the best plan for the construction of a cretin asylum, were assigned, the first to the district physician, Dr. Nusser, of Vienna, the second to Dr. Erlenmayer, of Coblenz. In Germany, Dr. Schmidt lately published the report of the cretin institution of Saekingen, in the Grand Duchy of Baden; Dr. Medicus that of the Ecksberg institution, in Bavaria; and lastly, Dr. Zimmer published the eleventh yearly report of the celebrated cretin asylum of Mariaberg, in Wurtemberg. At Hanover a cretin asylum is to be founded by Dr. Davosky; indeed, wherever we look we find such institutions either founded or in a state of construction; thus England, France, Germany, Italy, Switzerland, Austria (Levana), and Russia have all establishments of the kind. In the Social Science Congress at Glasgow, last year, the project of establishing an asylum for idiotic children was discussed, and this year the same congress, at Dublin, renewed it.*

Who does not remember the heartfelt and enlightened letter addressed from Hanwell by Dr. Conolly, on the 17th October, 1860, to Dr. Browne.† If we consider, therefore, all the endeavours which are made for this cause by the most eminent men of Europe, we must come to the inevitable conclusion that they assume it to be a fact proved by experience that cretinism is incurable in the asylums by means of the medical educational system. And at this stage of our case we will again return to the question we raised at the commencement of our article. We have during the last few months visited two of the most distinguished asylums of this kind, namely, the Abendberg, where we had an opportunity of conversing for some time with Dr. Guggenbühl, and the almost princely establishment at Earlswood, near Red Hill, where we had the pleasure of making the acquaintance of Dr. J. Langdon H. Down; besides which we have recently seen the Asylum for

* Even to Gheel, which is not at all a fit place for idiotic children, a Commissioner of the Association of Medical Officers of Asylums for the Insane is to be sent, as decreed at Dublin.

† *Mental Science Journal*, Jan. 1861, page 294.

Idiots at Basle, under the superintendence of Professor Jung ; we have also conscientiously examined all the new reports quoted by us on the cretin asylum, and we have not omitted, finally, after a thorough study of the theoretical materials of this question, to obtain practical information by personal examination among the Cretin population as to Saltzburg, Styria, Switzerland, Lower Franconia, and Savoy. We merely quote all this for the single reason that our opinion in regard to the system of medical education and therapeutics of cretinism may not be put down as superficial, or as being obtained by insufficient means ; and it must be remembered that an article of this kind written for a journal must be perfectly accurate, and as concise as possible. At the outset we must observe that we are greatly in doubt as to the number of real cretins who are in the asylums especially devoted to them. For instance, we found in the Abendberg among the patients present in June of this year *only one cretin* ; the others were merely idiots, two of whom were elderly persons and confirmed lunatics. The number of patients only amounted to twelve, of whom only two paid. Since, the "Naturforscher Versammlung" at Berne, and also several physicians of that city, have given, and that repeatedly, a justly condemnatory verdict against Dr. Guggenbühl's institution, he still continues to uphold this asylum. We do not wish to be misunderstood ; we are the first who have described Dr. Guggenbühl's merits in detail, and we consider he has fully earned, and is entitled to, an existence free from pecuniary care, and an honourable acknowledgment of his services. We consider it unjust and unreasonable of his opponents continually to harp on the fact, that he has given no account of the donations which he has received, for we think only the donors themselves have a right to inquire into the subject, and presents given *sine conditione* require no public explanations as to the uses to which they are put. As regards the charges made respecting patients of the higher classes (chiefly English),* who were formerly at the Abendberg, seeking a cure for their malady, they must be considered as a purely private affair, and one into which it is as indiscreet as it is impertinent of his opponents to pry. In science we must divest ourselves of all subjectiveness, but it is a different thing to examine this, or any other institution objectively ; it then becomes a sacred duty which we owe not only to truth, but to science and to humanity, to speak fearlessly and openly. We are therefore not satisfied, at the Abendberg, with a few show rooms and the training of the idiots to point out plants, draw a few letters, and stammer some words, nor with the unnecessarily large chapels with stained glass windows,

* We saw two brothers at Earlswood, who were formerly inmates of Abendberg.

which have recently been added, while we found the diet poor, the beds and dormitories bad and dirty, no system of warming and ventilation, a neglect of baths, a want of good drinking-water, and an utter neglect of due care and management in the whole institution. Even its situation is, in our opinion, badly chosen. The reason presumed to justify its selection, namely, that at a certain height above the level of the sea cretinism does not exist among a population, may be termed a reason *ad absurdum*. It must be remembered, too, that the lessened degree pressure of the atmosphere at such a high level, and its dampness, are most injurious, as well as the fogs, the exposure to sun and wind, and the want of good water, added to which is the difficulty of communicating with the asylum in consequence of its position. As we said before, we found at this, the oldest and most celebrated asylum for cretins in the Abendberg, but one cretin, and there is but one to be found at Earlswood, and both these show-specimens of cretinism were pronounced by the directors of the two establishments to be perfectly and hopelessly incurable. Earlswood has a population of idiotic children which varies from 500 to 600, and amongst these there is only *one* cretin. If we promise ourselves a greater number by means of the valueless classification into "semi-cretins" and "cretineux," we can assure our readers that we only found at Earlswood *six* "semi-cretins," whilst at the Abendberg there were none. In the Idiotic Institution at Basle we did not find a single cretin of any one of the three classes among thirty-five idiotic children. It follows, therefore, that the three mentioned institutions can furnish no results of the system of a medically directed education for cretinism, seeing that there are as good as no cretins for cure and education. We have already proved that Dr. Guggenbühl's assertions respecting his former success and his former results are unsatisfactory. Dr. Down, at Earlswood, replied to our inquiry as to the recovery of cretins and idiots, "that there is no probability of being able to educate them so as to fit them for the common purposes of life, and that they can only be made available for the life in the institution." The same opinion has been expressed by other impartial observers in all countries, amongst whom are some of the most distinguished authorities of our science. It is therefore a great error to point out the inadequate management of an institution as the only ground for such insignificant results, and those who imagine that an impartial criticism of this question is actuated by merely subjective objects, and by the desire of opposing and negativing, are still more deceived. It is true that the eleventh Report (1857-8) of the Mariaberg Institution in Wurtemberg maintains that out of fifty-four diseased children, there have been cured in one year three true cretins, three lunatic (irre) cretins, five deaf and dumb

idiots, and ten "semi-cretins." But how can we place reliance on such a classification and such results in presence of the Abendberg and Earlswood reports? From 150 patients in different forms of disease which Mariaberg received up to the middle of 1858, fifty-seven are returned as cured! But the few cases which are specially described are treated so vaguely and are sketched so unscientifically, that we cannot divest ourselves of the suspicion that these statements are exaggerated. The yearly report for 1859 of the Cretin Institution of Ecksberg, near Mühldorf in Bavaria, states that from sixty-three patients seven were discharged. It is noticeable, however, that the medical report only mentions two as being cured, and two as convalescent (*gebessert*), and even these were simple idiots. According to the information imparted by Dr. Macher, of the two Cretin Institutions of Styria—namely, at Admond (with twelve patients) and Gratz (with six), there are no full cretins among them, as none are met there. What does Dr. Zimmer, at Mariaberg, say to this? and also to the assertions of Dr. Zillner, at Salzburg, which are so clear and convincing? and what is the object of these subtle distinctions between idiots and cretins? The opinions which Dr. Kind published* on the occasion of a criticism of Dr. Ziller's important and valuable work are very true; he says that the expressions of sporadic and endemic imbecility (*sporadischer und endemischer Blödsinn*), classified as idiotism and cretinism, are nothing but tautology. Now we ask, can the question be advanced by discussing imbecility from social causes (idiotism), or from territorial causes (cretinism)? How often can one or other term be properly applied? and what appellation can be given to those who form the largest class, and suffer from both causes combined. The foetal or early Basiliarsynostose of Virchow has precisely defined cretinism, and he has so considerably modified it that most idiots cannot be termed cretins. Even the division between imbecility from birth (cretinism), or that occurring at a later period (idiotism), cannot be accepted, because, firstly, cretinism would not embrace and exhaust all cases of imbecility from birth; and then, again, there are many cases of acquired imbecility which may be traced back to their foetal life. Generated imbecility is very illusory, as the act of generation is not sufficiently cleared up. Even the division of cretinism, idiotism, and imbecility into three parts, in which the principle of gradation may be observed, rests chiefly on wrong notions of *à priori* origin. This must suffice on the subject of the much-favoured classifications of these diseases. To return, then, to our

* Refer to the *Allgemeine Zeitschrift für Psychiatrie*, vol. xviii., part 1, 1861, p. 89.

original question, we think we have furnished sufficient proofs that the education of cretins, as a therapeutical means, irrespective of its rare application, has never yet produced any cures, nor can ever produce any. How is it possible, we ask, to cure by medical education the following organic changes?

a Anomalies of the brain and its membranes and bones of the skull.

b Brain atrophy.

c Anomalies of the system of bones.

d Contractions of muscles, atrophic weakness, fatty degeneration, spasms, and paralysis of muscles.

e Goitre.

f Anomalies of the valves and heart atrophy.

g All the anomalies of functions, such as those of the senses, of movement, of feeling, of language and voice, of size, of growth, of carriage of the body, &c., &c.

We will willingly admit that a certain degree of improvement in specified patients is possible, and that it will be practicable in the progress of science and humanity to diminish the *traumatic* congestive, topic, and miasmatic idiotism by progressive culture; but we doubt that science will ever be able successfully to battle against constitutional and incidental idiotism. How little medical pedagogy has till now engaged itself with cretinism in the various institutions, may be proved by the small number of cretins who are their inmates, and the considerable number to be met at large. We are really alarmed by the fact that at a census ordered by Napoleon I., in the year 1811, in the Canton of Valois, in Switzerland, there were found 3000 cretins. (Why does not Dr. Guggenbühl compose any statistical tables of his country?) In the canton of Berne we have the researches of Dr. Schneider; in the Jura formation he counts 1 cretin to every 614 individuals; in the Molass formation, 1 to every 271; and in the Alpine formation, 1 to 361. In the Sardinian States, the census in 1845 proved 7087 cretins and 21,841 goîtres; which gives, in a population of 2,651,106, 1 cretin to 374 individuals, and 1 goître to 121. In some villages the average was 9 cretins in 100. In the total population of Europe, we count, just as in the lunatic population, 1 cretin to every 1000 persons. We think, as we have already maintained of the lunatic population, that this average is below the reality. If, then, the system of medical education has done nothing, and gives no hope for good results in future, the important question arises, "Whether an asylum life for cretins is desirable, and their sequestration justifiable?" As this question forms, at the same time, the great reform debate of the lunatic question, we cannot enter on it in this article. It seems absurd to order a useless sequestration of

cretins, as it is unreasonable and unjust. It cannot be denied that, with all the ostentatious display of the cretin schools, they produce no greater results than the outer world. How is it that, with all their means and appliances, they can effect no metamorphosis in the organs of the minds of their patients? The feelings are not capable of exciting any attention in the mind, or of rousing any of its emotions. The mechanical process of making incoherent sounds at which they arrive, the pointing with the hand, and even of writing a well-formed letter, and articulating it aloud, are, after all, nothing but mere tricks, which are far surpassed by apes.

There are some scientific medical men who will not look upon the cretin as a human being, and who maintain that he has no position in the scale of animal creation; they call cretinism not a disease, but an arrest in the formation of an individual, a mere monstrosity of the human race which may be allowed to wither unheeded in the path of life. Far be it from us to share notions so barbarous in their consequences! If we can neither medically nor educationally cure cretinism, let us at least endeavour to minister to these unfortunate beings as much as lies in our power, and ameliorate their condition with all our science and art. We therefore think it a fearful sin if the governments and local authorities of those districts where such unhappy individuals exist neglect drainage and purification in general; such as the regulation of lakes, the position of houses as regards northern aspect, omit to build schools and supply proper medical officers and clergymen, and disregard the improvement of generation by crossing blood in marriage, and do not erect proper nursing establishments for those unfortunates who cannot enjoy their share of earthly good. It may be that there may arise a less prejudiced and more humane time, in which the purely scientific and formal differences of idiotism, cretinism, and imbecility will be altogether ignored in practice. There may be a time when separate asylums will be erected for incurable adult lunatics, and for lunatic children and new cases. These instances ought to be carefully separated from the general lunatic asylums, and not dealt with as is done in these days, where lunatic asylums very much resemble the pattern-card of a commercial traveller, presenting all varieties, from the child in his cradle to the old man on his death-bed. What use this can be to therapeutics we will not here inquire, but only wish this better time may not be too far off to be realized in our own days.



ART. VIII.—MEDICAL STUDENTS:—A NEW GENERATION.

A REPUBLICATION of "The London Medical Student," a brochure from the pen of the late Mr. Albert Smith, and originally contributed as a serial story to *Punch* in its early days, induces us to cast a glance at the character and habits of the young men by whom the ranks of the profession are recruited. In times past they have been made the sport of fiction, and it is due to them to show how little that fiction can be justified.

We are convinced that Mr. Smith, although himself a member of the medical profession, did not draw from observation the characters that he describes. His medical students are clearly hypothetical animals, imagined under the impression that the rules and regulations of the licensing bodies of his day were strictly carried out, and that they produced infallibly their natural results. So far was this from being the case, that, in spite of the influence of the Apothecaries' Company, the medical students of London have for many years been constantly increasing in steadiness, diligence, and self-respect.

The error into which Mr. Smith's book is calculated to lead those who may peruse it, is very pardonable in an unprofessional writer. We can smile at the "Sawbones in training" of Mr. Dickens, and sympathize with the enthusiasm with which Mr. Pickwick, prior to experience, felt and expressed concerning them. But they are not brought before us as average specimens of the class to which they belonged, neither are they held up as examples for imitation. Their faults are redeemed by an admixture of humour and kindness, and their characters early display a sufficiency of sense to form a probable basis for their eventual reformation. From Mr. Muff and his friends, however, the heroes of Mr. Smith's book, we turn with unmixed disgust; their acquired profligacy in no way redeeming the dulness of their natural imbecility, and the whole production exciting our surprise that any writer of repute could attempt to foist such creations upon the public. *Ex nihilo nihil*, and the general practitioners of England, with all their faults and shortcomings, possess qualities of heart and mind for which Mr. Smith gives them no credit, and an amount of skill and knowledge such as no amount of "grinding" could supply.

Until quite recently, however, medical education was conducted under regulations which were exactly calculated to make students all that Mr. Smith describes, and which, notwithstanding that

they were largely evaded by the common sense of the public, have set their seal of evil on the profession. The Act of 1815 gave a practical monopoly of middle-class medical education to the Apothecaries, a trading company, whose corporate mind returned continually to the contemplation of rhubarb, and whose members regarded the preparation and sale of physic as the highest possible achievement of their art. In order that pills might be perfectly round, they condemned their future licentiates to suffer a five years' apprenticeship; and bowing to the well-known dictum that the compounding of medicines was an employment unworthy of gentlemen of liberal education, they took care to frame such regulations that no licentiate of theirs should ever presume to be liberally educated. For the attainment of this end, they gave the licence at the age of twenty-one years; and prescribed a hospital course and an apprenticeship, extending together over eight years, so as to necessitate removal from school at the age of thirteen. It is evident that a boy of thirteen cannot usually have made sufficient progress in the great essentials of education to be at all under their influence in point of intellectual character. Even in the most favourable cases, he will have done little more than to overcome the preliminary difficulties of acquisition—the mere drudgery of learning; and if he is there to stop, he might have been employed with equal advantage to his future career upon drudgery of any other kind. It is also evident that no prudent practitioner would allow an apprentice of thirteen to compound medicines; and that no prudent patient would swallow anything suspected to be such youthful handiwork. Practically, therefore, the first years of apprenticeship were spent in merely menial drudgery, in the tasks and duties of an errand-boy. Washing bottles, carrying out medicines, opening doors, running errands, and inventing evasive answers in his master's absence; such were the ordinary occupations of the young apprentice. As time passed on a larger sphere of action opened to him. "To see practice" became an object of ambition—attainable only by dint of practising upon the poor. And masters who reviled druggists for counter practice, who revelled in visions of some distant future in which all quacks should be whipped after a summary conviction, who believed that the sale of a pennyworth of jalap ought to be a penal offence, and that protection for the British doctor would be the *summum bonum* of judicious legislation, these very masters permitted their apprentices to visit and prescribe while in utter ignorance of the veriest rudiments of pathology and therapeutics.

This "seeing of practice," in large towns especially, involved another evil—that of attendance upon labours. The young apprentices were to be encouraged to soothe the throes of the parturient prostitute, and to defile their adolescence with all the filthy asso-

ciations by which low midwifery is surrounded, with the companionships, the conversation, and the gin.

As a finale to these proceedings, the emancipated apprentice was to settle in some large town, there to join a Medical School in the capacity of a full-blown student, and to attend lectures upon many profound and difficult subjects. It is hardly surprising, we repeat, that writers of fiction should have imagined his moral and intellectual status to be such as the ordeal we have described seems calculated to produce, or that they should have delineated their typical student as an imbecile and a hog. In doing so, however, they neglected to take into account certain sources of compensation, and hence have produced a caricature instead of a resemblance.

For experience has shown that the common sense of mankind early rose up against the yoke of the Worshipful Company, and contrived to keep within the letter, while violating the spirit of its rules. Apprenticeship was usually delayed, and the hospital course made coincident with the last three years of the nominal servitude; an arrangement by which much objectionable drudgery was done away with, and by which three precious years were gained for school. But the fact remained, that boys of sixteen could never be sufficiently prepared, in general, for the reception of special education. They were cast into the ranks of a profession which, of all others, most requires a trained and philosophic mind, at an age when their minds were untrained and chaotic. Some passed safely through the ordeal, and emerged Abernethys or Coopers. The great majority became bewildered by complicated problems, with which they had never been trained to grapple, and limited their views of causation to the last antecedent; of effect, to the last consequent. They were developed by time into the class of practitioners who constitute the weakness of the profession, and who afford whatever basis of truth there may be for the attacks of satirists.

Intellectual and moral weakness are very commonly coincident, and a system of training that seemed intended to prevent young men from being logical, could scarcely fail to render them indifferent to obligations higher than those of science. According to our observation, the men upon whom apothecaryism has fallen with its full weight, are affected injuriously both in mind and conscience. Permitted or encouraged during apprenticeship to undertake medical duties empirically, and without the knowledge necessary for their due discharge, they learn to aim at the end without securing the means, and to be content with a diagnosis and treatment founded upon guesswork. In this way, they gradually ignore the fact that they cannot, without grave delinquency, neglect the opportunities of study afforded them; and they look forward to their examinations as ordeals to be got through any-

how; satisfied with themselves if they can by any means satisfy their questioners; and feeling no reproach when forced to convict themselves of ignorance. In practice, men of this class are found to fulfil the promise of their early lives, and to undertake the treatment of any case promising to be remunerative, whether they understand it or not; while among the poor they will seldom be at the trouble of investigation. We were once standing in the surgery of one of these worthies, when a poor man came in, having organic visceral disease stamped upon his countenance. His narrative of symptoms was speedily cut short, not by inquiries pertinent *ad rem*, but by "Give him some powders, Mr. Jones." Mr. Jones, the assistant, thrust his hand into a drawer full of powders, and with rapid and dexterous movement tied six of them into a packet. "Take one night and morning," he said, and the patient withdrew. When he was gone, we inquired of the principal, "What is the matter with that man?" "Oh, I don't know, I'm sure," was the reply; "I never saw him before. He is only a *club patient*!" "Well, but what did you give him?" "Oh, those powders. They contain some nitre, and a little Dover's powder, I think; don't they, Mr. Jones? We keep them for club patients." For such results as these, it is hard to say who are most to blame, the clubs or the apothecaries; but we incline to think the latter, because they have so long degraded the art of healing into a trade, that the public take them at their own valuation, and apply trade maxims to them. However this may be, it is quite evident that a system of education which places manual dexterity in compounding above cultivation of the intellect must be disastrous in its results, and must train up men having no proper consciousness of the importance of their calling, or of the heavy moral and intellectual responsibilities imposed by the confidence vested in them. And although medical students never were, and never could be, the yahoos depicted by Mr. Smith,—still medical students have, by their shortcomings, set their seal upon one generation of the profession. To them it is due, we think, that medical men although marching have not kept pace with the times, and that while advancing, they have retrograded relatively to the advance of other classes—such as the clergy and the legal profession. Quackery of all kinds is mainly due to professional errors; and although fashionable quackery may be due to errors arising out of the present state of science, or resulting necessarily from human infirmity, this is but a small portion of the whole. The quackery that affects the million, and that too often saps the health and strength of the poor, the stall of the medicine-vendor in the country market-place, his handbills and house-to-house visitation in the village, and the counter practice of druggists in towns, all these are due to professional errors arising out of the carelessness and

culpable ignorance of students who have neglected the opportunities of acquisition afforded them. The practice of selling medicine, of representing it as the element of value in medical attendance (as if a carpenter should charge for his tools instead of his labour), has also greatly aided the impositions of the quack, who ever bases his pretensions upon his nostrum rather than upon his skill.

To culpable and avoidable professional errors we ascribe another remarkable feature of the present age in medicine—that is to say, the existence of special hospitals. They represent, not the knowledge of the few, but the ignorance of the many—the dishonest ignorance, that tries to pass itself off for knowledge, and that undertakes duties for which it has never been at the pains to qualify itself. Whether or not it be possible for ordinary practitioners to become thoroughly skilful, with hand, senses, and judgment, in every branch of the profession, so that a case of talipes or of ophthalmia will eventually be as well treated by the parish doctor as it would be in Oxford-street or at Moorfields, is a question that only time can solve. But we have seen double congenital talipes mistaken for paraplegia, until the patient, at the age of fifteen, was accidentally seen by a “special” practitioner; and we have seen, during a single morning visit to a provincial ophthalmic hospital, at least a dozen persons who had been positively blinded by injurious, or allowed to become blind by misdirected treatment. Correal ulcers had been doctored by lead lotions, so as to leave indelible cicatrices; and ophthalmia, produced by the irritation of eyelashes, or other foreign substances, had been assailed by some of the most potent weapons in the medical armoury, while the cause of the mischief remained undiscovered and unremoved.

We trust, however, that the session now commencing will be the precursor of a new and better state of things. Under the provisions of the Medical Act, there will be no necessity for general practitioners to possess the Apothecaries’ licence, or to undergo the Apothecaries’ apprenticeship. The recommendation of the Council, that all students shall be required to give evidence of having received a liberal education prior to the commencement of medical study, will serve to keep young men at school or college until they are old enough to go to a hospital, and while it will greatly raise the standard of mental cultivation, the expense entailed will serve indirectly to raise also the standard of social station, and to fill the lecture-rooms with men having the feelings of gentlemen, rather than the desires of traders. And it behoves the new and higher class of students, promised to us for the future, to lay seriously and earnestly to heart the responsibilities which their advantages entail. Their predecessors, not-

withstanding the heavy yoke of the Hall, have, in the great majority of instances, shaken themselves free from the results of bearing it. Here and there, it is true, the typical apothecary may be found, ignorant, careless, greedy, venal ; neglecting his patients for his ease, or abusing their confidence for his profit, and casting the shadow of his character over the acts and opinions of wiser and better men. But the great bulk of the practitioners of England, both in point of intellectual and moral character, deserve praise which can only be fairly meted by those who know the hindrances of student life ; and we warn our young friends, now about to plant their feet upon that path, which, having travelled over, we cannot look back upon without regret, that the public have a right to expect great things from them. “ Art is long, and life is fleeting ; ” the time allotted to medical study is fleeting indeed, and every portion of it that is wasted in idleness, or consumed in vice, will not only be the parent of bitter, unavailing regret in the face of the responsibilities of the future, but will most surely tend to degrade the medical body in the degradation of the individual delinquent. We expect, then, that our educated students shall show a right appreciation of their opportunities and of their duties, that they shall bring to the dissecting-room and the lecture-hall minds accustomed to reflection, and habits obedient to the voice of conscience. In other departments of life, men may be idle or careless with less of culpability, with the prospect, at least, of being themselves the chief, if not the only sufferers. In medicine, the case is widely different, for the errors of the ignorant practitioner fall upon the defenceless, and are often irremediable. From errors of some kind, no man, however skilful or learned, can hope to be entirely exempt ; but such evidences of human frailty will become more rare just in proportion as our ranks are recruited by students of enlarged views and cultivated intellects. Empirical practice, notions of applying specific formulæ for the cure of nosological distinctions, will vanish before a system based upon scientific pathology and rational therapeutics ; and miserable quarrellings, envyings, jealousies, bickerings, would be impossible among men accustomed to practise instinctive courtesy, to respect each other because respecting themselves, and to be ruled by an unwritten code of ethics, arising out of a clear comprehension of their duties to their patients, to the public, and to their brethren.

ART. IX.—THE STATE OF LUNACY IN ENGLAND.

THE Fifteenth Report of the Commissioners of Lunacy, now before us, is of unusual interest. In addition to the subjects ordinarily treated, the Report contains a series of statistical tables in continuation of those published in the Eighth Report of the Commissioners, and a discussion of the causes which give rise to a progressive increase of patients in our asylums.

It would seem, indeed, as if the Commissioners had become fully alive to the necessity of removing that unpleasant vagueness which has so long vitiated the statistics of insanity in this country, and which became so painfully, and, we may add, seriously manifest during the late Parliamentary Inquiry on Lunatics, as we had occasion to point out more than once at the time.* For example, the official evidence on the vexed question of the increase of lunacy in the kingdom left the Select Committee almost entirely in the dark, notwithstanding that the solution, or approximate solution of that question had a highly important bearing upon its deliberations. The ordinary asylum returns showed a steady increase from year to year in the amount of known lunacy. Asylum accommodation barely kept pace with this increase, leaving out of consideration altogether the large number of the insane most unfitly confined in workhouses. Was the known increase of lunacy dependent upon an actual augmentation of the number of lunatics among the population, or was it to be accounted for on other grounds? It is manifest that upon the answer to this question must, in a great measure, depend any satisfactory solution of that difficult problem, the further provision for the insane. But although it was suggested in evidence that the increased attention given to lunacy, and consequent bringing to light of cases previously unnoticed, and the possible prolongation of life among the inmates of asylums, might give rise to an accumulation of lunatics, even to an extent rendering unnecessary any supposition that there was a true and progressive increase of insanity among us, no data were produced by which the actual value of these suggestions could be tested. So far from any light being thrown upon this question by the Parliamentary Inquiry, it was if anything made more obscure.

In their present Report the Commissioners of Lunacy for the first time give us some precise information upon the probable

* See *Journal of Psychological Medicine*, vol. xii. p. 337, 387; vol. xiii. p. 437.

sources of the progressive increase in the amount of known lunacy in the kingdom. Why this information should not have been forthcoming before the Select Committee of last Session, (1860) terminated its sittings, it is difficult to surmise. Notwithstanding, however, that it is much to be regretted that the results now made known to us were not then given in evidence, we are only too glad to get hold of them to indulge in much retrospective grumbling.

In what follows on the increase of known lunacy, we shall adhere almost verbally to the Report of the Commissioners.* It may be well, however, in the first place, to indicate the importance of the subsequent details, by stating that they tend to the following conclusions:—

1. That the increase of known lunacy for several years back has been confined almost solely to pauper lunatics.
2. That the amount of known lunacy among those classes of the population who are raised above pauperism, or are liable to pauperism from lunacy,—the wealthier classes, in short,—has been diminishing, or at least has been stationary, for some years.
3. That it is probable that lunacy is not increasing in the kingdom in greater proportion than the increase of population:—the apparent increase of lunacy among us, as shown by the steadily growing population of our asylums, and the need for still more and more asylum accommodation, being dependent mainly upon certain circumstances incidental to the provision made for the care of lunatics in late years.

From the 1st of January, 1849, to the 1st January, 1859, the number of lunatics in the various asylums of England and Wales advanced from 14,560 to 22,853.

	Jan. 1, 1849.	Jan. 1, 1859.
County and Borough Asylums	6494	15,845
Lunatic Hospitals	1135	1992
Licensed Houses	6931	5016

The increase, as these figures show, was chiefly confined to public asylums, the lunatic population of the county and borough asylums having augmented 9351 in the ten years; that of the lunatic hospitals, 857; while there had been an actual decrease in the number of patients in licensed houses to the extent of 1915.

The great increase in the total number of lunatics in asylums during the ten years was limited almost entirely to pauper and criminal patients.

Within the same decennial period the number of *pauper*

* See Report, pp. 75-84.

lunatics detained in public and private asylums and hospitals had advanced from 10,801 to 18,022—an increase of 7221 patients. The number of pauper lunatics detained in county asylums was more than doubled during the period, the augmentation being from 6269 to 15,618; but in the same period the number of pauper lunatics in licensed houses fell from 4178 to 2188—a diminution of 1990.

The returns of *private patients* show a total increase of 1072 in the ten years; namely, from 3759 to 4831. In county asylums the number of private patients remained nearly stationary, there being an increase of only *two* cases. In licensed houses the number had advanced from 2753 to 2828; in hospitals from 781 to 1776. "But as regards the number of private patients in licensed houses, it is necessary to bear in mind that, in the return made in 1849, the patients in the licensed house at Abington Abbey were then placed to the account of hospitals; that a large number of State patients at Fisherton are now regarded as private patients; and that the insane belonging to the army and navy are now also enumerated as private patients, but were not included at all in the computation in 1849." In January, 1859, the military and criminal patients, with the inmates of Abington Abbey, amounted to more than 300, and the apparent increase of private patients in licensed houses during the ten years was only 75; hence the Commissioners arrive at the conclusion that from the year 1849 to 1859 there was a decrease of at least 225 private patients in the licensed houses of England and Wales.

As respects the apparent increase of 995 private patients in hospitals, it would appear that there has to be taken into consideration that the number includes the inmates of Bethlem Hospital, of the Idiot Institution at Earlswood, and of the Naval Hospital at Haslar, who did not appear in the return for 1849. Now, on the 1st of January, 1859, the inmates of these three institutions amounted to 788; and after deducting this number from the aggregate return of all private patients in Hospitals, it is found that the number of insane private patients in the hospitals in England and Wales had increased to the extent of about 207 cases in ten years.*

"As, therefore," say the Commissioners, "there has been only an addition of two such cases in county asylums, and as there has been a diminution of numbers in licensed houses to the extent of 225, we may draw the inference that, taking an aggregate of the inmates of all the various asylums in England and

* In a foot-note the Commissioners say: "The number of patients in Abington Abbey being nearly equal to the military officers at Coton Hill, the subtraction of the one and the addition of the other would not affect the calculation."

“Wales, there has not been any increase in the numbers of registered private patients during the period of ten years ending 1st January, 1859.

“Thus it appears, that while in the period above referred to pauper patients in asylums have advanced to the extent of 7221, there has been no addition to the number of private patients.”

The returns for the ten years also show a curious and noteworthy disproportion between the two sexes among the private and pauper classes of patients. As respects the former, in 1849 there were 5 more women than men, whereas in 1859 the men exceeded the women by as many as 419. This circumstance is, however, to be explained by the consideration, that at the latter period the military and naval, as well as a proportion of the State patients, were added to the number of private patients. But as respects paupers, in 1849 the women exceeded the men in number by 851, and in 1859 this disproportion amounted to no less than 1680, a result caused by the rate of mortality being lower among women than men.

We learn, therefore, from the foregoing calculations, that *while the number of pauper patients has increased so enormously, there has been no augmentation of the private class.* Nay more, the Commissioners say—

“It is to be remarked as respects the class of private patients, in reference to the circumstance that their number in licensed houses has fallen considerably during ten years, and that in asylums generally there has been no increase—that many old-standing cases not before reported are included in the returns as now made; and it is evident, therefore, that a just comparison of the relative numbers at the beginning and end of the period under review, can only be made by deducting from the present number the cases formerly omitted. By doing this, we arrive at the conclusion that the proportion of private patients in the various asylums in England and Wales has diminished during a period of ten years; and this, notwithstanding the improvements effected in those houses during that time, rendering them more comfortable and cheerful, and increasing the inducements to send patients into them.

“To ascertain, if possible, the cause of this large increase of Pauper Patients in so short a time is,” say the Commissioners, “obviously important, and the questions naturally arise,—May it be attributable to an increased amount of pauperism in the country, or to a greater liability to attacks of insanity among the poorer classes, or to both these agencies combined?

“We have positive information that pauperism has decreased,*

* “The decrease in the average number of paupers of all classes in receipt of relief at one time in 1859, as compared with 1849, is 20.5 per cent.; and as regards able-bodied paupers, the decrease in 1859, as compared with 1849, is 40.7.”
—*Twelfth Report of the Poor-Law Board.*

and we are unable to discover any material changes in the social condition of the labouring population rendering them more prone to mental disease."

Failing, therefore, to find a satisfactory solution on the ground of increase either in pauperism or insanity among the poor, the Commissioners are driven to search for some other source of a result, which they justly characterize as so remarkable. With this view, they have taken into consideration "every circumstance bearing directly or indirectly on the condition of the insane poor, which may have had the apparent effect of increasing their number," and they have classified the agencies at work under the following heads:—

1. The large number of cases previously unreported, and only recently brought under observation.
2. The increased number of those sent to asylums.
3. The prolongation of their life when thus brought under care.

Upon the first head the Commissioners say:—

"There can be very little doubt that the system of observation and inquiry adopted of late years, however imperfect it still may be, has led to the detection and classification as insane of many persons formerly looked upon as ordinary paupers. The definition acted upon by us, that all persons receiving relief on account of mental infirmity should be included in the return; our own visitation of workhouses; the payment made to district medical officers for their attendance on single patients, and for drawing out lists of them four times a year, have all been instrumental in placing on record many cases previously overlooked. Again, the annual returns required from the parochial authorities, and which form the basis of the general summary, although still incomplete, are made in a more satisfactory manner; the omissions both of individual cases from the list, and of unions making no return whatever, being less numerous now than formerly. By these means, therefore, a considerable number of patients, before passed by, have been added to the general reckoning of insane paupers.

"The erection and opening of county lunatic asylums throughout the country may also have contributed to the same end, by exciting the attention of the public to the subject, and thus tending to the discovery and presentation of fit objects for such institutions."

Upon the second and third heads the Commissioners observe:—

"We now come to consider the effect produced by the removal of patients into county asylums, and especially of those affected with a chronic form of the malady. A very large amount of additional accommodation having been thrown open during the period under review, the parochial authorities have availed themselves of it, and removed to asylums numbers of paupers who would otherwise have remained in

the workhouses or cottages. Our own visitation of workhouses, and the careful examination of the Quarterly Lists of single patients, have caused the removal of many such. The result has been that a large number of pauper lunatics, previously most unfavourably circumstanced, have been placed in houses specially adapted to their cases, and calculated to promote longevity. To what actual extent this has tended to prolong life is a question not easily solved, because we are unable to discover the rate of mortality that prevailed among this class of patients before their reception into the asylums. But we are warranted in assuming that when destitute and diseased persons are placed under care in establishments well constructed, well regulated, and specially adapted for their protection and treatment, and in which they receive succour, abundant food, and careful medical supervision, the result will be a prolongation of lives which otherwise would have been of short duration. In every other situation, whether lodged in cottages or in workhouses, insane paupers are exposed to many causes of disease and death, from which in county asylums they are entirely protected.

“While estimating these effects, it is right also to bear in mind that an improvement to a certain extent in the condition of those remaining at home or in lodgings, may have been effected by the regular medical visitation of them which was instituted in 1853. In all probability, some of the causes of disease to which they were formerly exposed have been averted, and an increase of numbers arising from a less rapid removal by death may have taken place. A like result may also have arisen as respects the inmates of workhouses formerly in unhealthy and densely populated localities, but now removed to more open and salubrious sites.”

In corroboration of this assumption the Commissioners allude to the relative number of insane paupers in districts provided with asylums, as compared with localities where no such provision has been made. They say :—

“If we bring into comparison the two counties of Monmouth and Hereford, having asylum accommodation, with the three counties of Cardigan, Carmarthen, and Pembroke, where no such accommodation exists, we find that the population of the two former counties is nearly equal to that of the three latter; but that where provision has been made, the number of pauper lunatics appears to be in excess in the proportion of 514 to 456; and further, that an excess of 2000 paupers in receipt of relief are reported in the district having no asylum, over the one provided with such accommodation. Thus, in two contiguous districts in South Wales, nearly equal in population, the one which has a large excess of paupers receiving relief, has at the same time a considerably smaller number of insane paupers under care.

“A similar instance may be adduced in the county of Kent. The boroughs of Maidstone and Canterbury are nearly equally populous. The former has during a very long period provided for its insane paupers in the neighbouring county asylum, whilst the latter has made no provision whatever, and the returns now show double the number of insane paupers in the provided over the unprovided borough.”

The Commissioners then proceed ;—

“ Having taken into account the probable effect produced by opening county asylums, and thus bringing insane paupers under their shelter, we now enter on a branch of the subject more capable of demonstration, namely, that the diminished rate of mortality in many of our county asylums, and especially in the large pauper houses, produced in all probability by improved accommodation, food, and medical treatment received therein by the patients, has been an obvious cause of the increase in their numbers. For instance, the average annual mortality in the three metropolitan licensed houses receiving paupers, was, during the five years ending 1843, upwards of 18 per cent. of the patients resident ; whereas for several years past the proportion of deaths has been so considerably reduced below this high rate as to have caused a large addition to the aggregate number of pauper patients in the metropolitan district.

“ The effect of the death-rate in diminishing or augmenting the number of patients in asylums may be best shown by noting its operation in the two sexes. It is well known that the rate of mortality stands higher in the male than in the female wards ; but the full effect of the greater or less fatality of the disease in lessening or increasing the number of the insane population, can only be fully estimated by observing the changes among the inmates of asylums during a long period of years.

“ In illustration of this, we propose to review the movement of the population in the county and borough asylums, as shown in the tables now published. From these it appears that in the five years ending January 1st, 1859, a larger number of men than of women were admitted, and during the same period 700 more women than men were discharged ; from which it might be presumed that a corresponding diminution would be the result. We find, however, that at the end of that period, there were 227 more women than men patients as compared with the relative number at its beginning. Thus, by reason of a lower rate of mortality among women, although a smaller number were admitted and a larger number discharged, yet in relation to the number of men there has been a considerable increase. In fact, as 700 more women than men were discharged, the lower death-rate among the women may be said to have augmented the number of this sex by nearly 1000 during a period of five years.

“ In the general population of the country a somewhat analogous effect results from a like cause. A much larger number of boys than girls are born every year ; and yet, owing to the greater rate of mortality among the former, the result is a considerable preponderance of women.”

From the foregoing considerations, the Commissioners are inclined to believe, that the great accumulation of pauper patients, as shown by their own records and those of the Poor-Law Board, is mainly attributable :—

1st. To the more complete collection of annual returns, formerly very defective in this respect.

2nd. To the detection and registration of cases formerly left unnoticed.

3rd. To the removal of a larger proportion of patients from localities where they were exposed to causes of death, into asylums favouring the prolongation of life.

4th. To the effect of sanitary regulations in asylums, of improved diet, and of various means of sustaining the health and promoting the longevity of the entire body of inmates.

5th. To a like effect on those out of asylums, from the removal of large workhouses to more healthy sites, and from the medical visitation of such of the insane paupers as are neither in workhouses nor asylums.

The Commissioners then proceed thus:—

“Though it might, on the other hand, be fairly supposed that the increased proportion of cures in recent cases sent to asylums, caused by the improved modes of treatment now adopted, would have had the effect of diminishing the aggregate numbers resident, this latter cause of decrease in the comparatively few recent cases admitted, has apparently been more than counterbalanced by the prolongation of the lives of the many chronic cases brought under care.

“And as in certain localities unprovided with any recognised means of sheltering their insane paupers, we have shown that their seeming proportion to the population is small, so if we look to other countries we shall find that in proportion to the amount of the provision made by the State, will be the apparent ratio of the insane to the population.

“Considerations such as these furnish abundant reason for discrediting the statements which foreign authors have founded on our returns, to the effect that the inhabitants of this country are more liable to insanity than those of any other civilized state.

“Having thus indicated what we believe to be the causes of the great apparent accumulation of pauper patients, we come to deal practically with the fact that such causes being still in operation, we can only calculate on a further progressive increase; and we accordingly draw attention to the subject, in the hope that committees of visitors will see the necessity of a timely increase of accommodation. Whether some means might not also be adopted for effecting a legal transfer of some of the harmless and chronic pauper cases to the care of relatives, with provision at the same time for securing the payment of an adequate sum for their care, maintenance, and medical visitation, is, we think, matter for consideration deserving the attention of the Legislature.

“At a time when so large an amount of public accommodation exists, it may seem unreasonable to urge the necessity of making further provision; nevertheless, the returns before us show the importance of such a step, for the admissions into county and borough asylums during the latter half of the ten years under review, appear to have been in excess of the former half, to the extent of nearly 3000. During the five years ending 1853, 20,544 cases were admitted; and

during the five years ending 1858, the numbers were 23,256; showing a steady increase in the influx of patients into our public asylums."

The Commissioners next observe that, even during the past year only, the number of patients in county and borough asylums has advanced to the extent of no less than 1151; and, finally, they conclude this most important portion of their Report in the following words:—

"It might be supposed that the admission of so many patients into asylums would be followed by a corresponding, or at all events a considerable, diminution of those placed or retained in workhouses, or receiving out-door relief. So far from this, however, being the case, the subjoined return shows that the insane poor, whether in workhouses or as single patients, have not diminished, but on the contrary have increased in number to a very considerable extent; a circumstance attributable in all probability, as we have endeavoured to point out, to the more complete registration of cases, and the greater attention which has been paid to their well-being of late years."

Assuming the probable correctness of the foregoing conclusions of the Commissioners in Lunacy, and that there is no sufficient evidence of an increased tendency to insanity among the population, the difficulties to be contended with in providing for our lunatics are in no degree abated. The actual condition of things in this respect is, indeed, just the same as if there were a real, progressive increase in the amount of lunacy in the kingdom. But the importance of ascertaining the true state of lunacy beyond the walls of our asylums and workhouses becomes still more apparent. We have often urged the need which exists for this knowledge, and we must perforce return to the subject again. Either our asylum accommodation has not been sufficiently extended to exhaust the substratum of chronic lunacy existing in the kingdom, or the increase of accommodation has taken place at so slow a rate, that it has never at any time overtaken the wants of the population. If the latter be the case, a large proportion of lunatics have been passing into a chronic state contemporaneously, and in about an equal degree, with the increase of accommodation.

Hitherto we have been content to deal with difficulties as they arose by meeting the immediate requirements of the moment and no more; and it is proposed to meet our present great difficulty, the crowding of asylums with chronic cases, and their consequent inefficiency as curative institutions, in the same fashion. Our asylums are, in fact, chiefly lunatic receptacles—asylums not in the sense of hospitals for cure, but hospitals for life-provision. The suggestion to provide other, and above all subsidiary (overflow) asylums, is no doubt necessary, but it is, after all, but a palliative recommendation. If, as the Commissioners assert, the

chief sources of the increasing population of asylums rest in the measures which gave rise to their formation, and in the nature of the institutions themselves, it is evident that unless the accommodation provided by them be so widely extended as to afford at once a chance of exhausting the dead weight of chronic lunacy existing at large in the kingdom, and of thus bringing us face to face with the nascent lunacy, those sources will remain fully operative. At present, we simply extend our asylum accommodation proportionately to the evils (that is, evils in relation to the failure of asylums as means for checking and controlling the increase of the lunatic population) arising out of the system, and *not the good*.

That counties, and boroughs, and cities should hesitate to commit themselves to an expenditure, which, as the Commissioners put it, may have an almost unlimited growth, and should, as a rule, confine themselves to such provision for the insane as is absolutely necessary, is very natural. For our present system of attempting to deal with pauper lunacy is very similar to that of an individual who might seek to dry up or check the course of a stream by lading the waters, and storing it in reservoirs, at the mouth. We have great reservoirs of lunacy, and solicit the stream of lunatics to flow into them. We find after twenty years that our reservoirs, new and old, are full to overflowing, but that there is no sign of abatement in the flow of the stream of lunacy. We, however, persist in crying out for more reservoirs, and display a most praiseworthy energy in seeing to the integrity of those which exist, and to the most fitting state of the contents thereof. But let us note briefly the rapidity of motion of the stream and the capacity of our reservoirs for its reception.

The rate of increase in pauper lunacy (including idiots) during the ten years 1847-57 was 4 *per cent. per annum*, that is to say, nearly four times the rate of increase of population, and of such magnitude that, if it persists, the number of pauper lunatics in the kingdom would be *doubled in twenty-five years*. The rate of increase of pauper lunatics in county and borough asylums in 1857 was such that, if it were maintained, the whole of the then present and prospective asylum accommodation would be filled in five years.* We now learn from the Commissioners in Lunacy, that as the causes of this great increase in our lunatic population may be said to be inherent in our system of dealing with pauper lunatics as at present carried out, we may anticipate (as the Commissioners themselves point out) a persistence of this increase; and we are instructed to meet it by a continuation of

* See *Journal of Psychological Medicine* for full details on this question, vol. xii, p. 340, *et seq.*

precisely the same system of management under which the increase is occurring, and to which it is partly attributed—a system which has for results, that for every individual lunatic cured, two, it may said, at a rough guess, become life-pensioners on the bounty of the public !

That this is a necessary consequence if the difficulties besetting the question be completely grappled with, we do not for a moment believe. But how is it possible to grapple with them without knowing all the data necessary for their solution ? It cannot surely be that we are to go on from year to year expending immense sums in carrying out a system of provision for our lunatics, a chief result of which is to augment the lunatic population of the country. Is it to be believed that this is a necessary result of an effective scheme of dealing with pauper lunacy ? That it is the result of the present scheme we now know on the authority of the Commissioners of Lunacy themselves ; and we frankly confess that we can see no help for it so long as we remain in ignorance of the actual state of the lunatic population at large in the kingdom. It is from this population that the crowds of chronic cases come in the first instance which fill our asylums, and interfere so seriously with their utility as curative institutions, hence bringing about a state of things which fosters chronic lunacy among lunatics at large. Until, therefore, we know the actual extent of the floating lunatic population, it is hopeless to imagine that any scheme can be developed which affords a reasonable hope of overcoming the difficulties which surround our present methods of dealing with pauper lunatics, or which would afford fair promise of ultimately holding in check the increase of pauper lunacy.

It is just to suppose that the diminution in the amount of lunacy among the wealthier classes of the population, is due in no small degree to the fact, that the provision made for the lunatics among these classes by private enterprise has been commensurate with the requirements of the case. It is just also to suppose that a similar result would follow from a like provision for pauper lunatics. But as private enterprise is sure to be developed proportionately to the field opened out for its exertion, it follows that it has an inherent power of adapting itself to the requirements of a people which public enterprise (so to speak) does not possess. For while the private individual limits his enterprise solely by the amount of present profit, as calculated by personal gain derived from it ; a public body is of necessity restrained in its action by the vaguer, less defined, and often variable character of notions of public gain, and by its being responsible not to itself merely, but to the behests of those whom it represents. Now, it is not to be expected that it either can, or will, or should act effectually without being fully possessed of all the facts upon which its action is required ; or if it does act in the

absence of such facts, that action must of necessity be imperfect, which is the case with the doings of our public bodies in the case of pauper lunacy.

We presume that the facts recorded by the Commissioners of Lunacy respecting private patients will somewhat modify the opinions of those who doubt the utility of private asylums. It is dangerous to the public weal at all times to tamper with legitimate private enterprise; and private lunatic asylums are no exceptions to the rule.

It is unavailing to regret now that the details on the increase of patients in asylums, contained in the present Report of the Commissioners in Lunacy, were not laid before the Select Committee. It is difficult to conceive that the Committee could, had this been done, have omitted to observe the extreme importance, if it were in an economical point of view only, of ascertaining the true status of lunacy among our population. It is difficult to conceive also that the Committee would not have reported upon the necessity of an inquiry directed to this end, and the facility offered by the then approaching Census of carrying such an inquiry into effect. Not that the Census would have given all the information required, but it would have given, in the best and most economical manner possible, the data needed, as a basis for more elaborate local inquiries. Ultimately this inquiry must be conducted at the time of the Census, and by the same machinery, or by a special Government Commission, and it is not easy to see how this could possibly do the work required; for its investigations must, in the first place, be as widely extended as those of the Census. Sooner or later, however, the vast economical considerations, increasing year after year in weight and moment, must force this question upon the attention of the public and the Government.

The statistical tables appended to the present Report of the Commissioners in continuation of those contained in the eighth Report, show (1), the number of patients admitted into and discharged (by death or otherwise) from the asylums of England and Wales during a period of five years ending 31st December, 1858; and (2) the ages of all patients on the books on the 1st of January, 1854, and on the 31st of December, 1858, respectively; also the ages (in quinquennial periods) on admission, at death of all patients who were admitted or who died during the five years ending 31st December, 1858. In these tables the different classes of asylums are distinguished. A summary is also added relative to patients admitted during the year 1857, showing the numbers discharged, and distinguishing those who were recovered, the number of deaths and the number of patients remaining under treatment in February, 1860, the whole being

grouped according to the duration of the disease on admission. From this summary we obtain the following important results confirming the great moment of early treatment in cases of lunacy :—

“Of 100 patients admitted in 1857, the duration of whose attacks at the time of admission did not exceed 1 month, 5·09 (or 509 in 1000 were discharged recovered, 9·7 (or 97 in 1000) were discharged relieved, 5·8 were discharged not improved, 17·8 (or 178 in 1000) died during the three years, and 15·3 were remaining at the end of the 3 years. Of 100 patients, the duration of whose attacks was 1 month and under 3, 45·4 were discharged recovered, 19·5 died, and 16·5 were remaining at the end of 1859. At 3 and under 6 months the percentage of recoveries was 35·2, of deaths 23·0, and of remaining 22·5. At 1 and under 3 years 15·8 per cent. recovered, 26·1 died, and 34·3 were left under treatment. Of 100 patients admitted, the period of duration of whose attacks was under 1 year, 44 recovered, 20 died, and 18 were remaining. At 1 and under 6 years, 14·5 per cent. recovered, 24·9 died, and 37·4 per cent. were remaining. At 6 years and upwards, 5·0 per cent. recovered, 17·3 per cent. died, and 63·3 per cent. were remaining under treatment at the end of the three years.

“From these results it would appear that the chances of recovery are much greater when the patients are placed under treatment in an early stage of the attack than they are when the disease has been allowed to remain unchecked for some time. The recoveries decrease with the increase of the period of duration of the attack at the time of coming under treatment, while the deaths increase as the period of duration of the attack rises to 1 and under 3 years, after which they decrease slightly in the next two periods.

“The proportion per cent. of patients remaining under treatment at the end of the three years increases progressively from 15 per cent. at the period of duration of under one month, to 63 per cent. at the period of duration of 6 years and upwards.”

We need not dwell at any length on the remaining portions of the Report. It is chiefly occupied by detailed statements of the condition of several county and borough asylums, hospitals, and licensed houses, noting the advances which have been made or shortcomings recorded in 1860. Several cases are also noted in further illustration of the opinions expressed by the Commissioners in the supplement to their twelfth Report, on the many evils arising from the present indiscriminate use of workhouses as receptacles for persons of unsound mind. Other cases of neglect, improper, or ill treatment, are reported at length. The subject of single patients is further pursued, and several examples of gross neglect brought to light. On the probationary treatment of patients, the Commissioners remark :—

“Some idea may be formed of the extent to which we avail ourselves of the power vested in us by the 86th section [permitting the absence of patients from asylums on trial], when we state that about one-fourth of the whole number of private patients resident in the houses licensed

by us, have been sent out on trial, or leave of absence, during the past year."

Certain changes have taken place in the Lunacy Board since the previous Report of the Commissioners. Lord Lyveden has resigned his seat at the Board. Mr. Procter (after 28 years' service on the present and previous Boards) has also resigned his seat, but has been appointed an unpaid commissioner. Mr. Forster, who has occupied the post of secretary for upwards of five years, has succeeded Mr. Procter as a legal commissioner; and the Hon. W. C. Spring Rice has been appointed Secretary.

One new asylum was opened in 1860, the asylum for the united counties of Bedfordshire, Hertfordshire, and Huntingdonshire, and when visited by the Commissioners on the 16th April, 1860, it contained 323 patients. Several asylums have been enlarged.

We add the tabulated summary of admissions to public and private asylums and hospitals in 1857, and the results in the cases so admitted during the three years 1857-58-59; also the summary, showing the state of the lunatic population of the different asylums throughout England and Wales in 1860; and the general summary for the five years ending 31st December, 1858.

TABLE showing the NUMBER of PATIENTS ADMITTED into the LUNATIC ASYLUMS, HOSPITALS, and LICENSED HOUSES in *England and Wales* during the year 1857; also the proportion per Cent. of the Patients so admitted in 1857 who were Discharged during the Three years 1857 to 1859, and also those who were Remaining at the end of 1859.

Duration of Existing Attack at the Time of Admission.	Total Number of Patients Admitted during the year 1857.	Proportion per Cent. on Patients admitted in 1857.						
		DISCHARGED. during the Three Years 1857 to 1859 (inclusive).						Patients Remaining at the end of 1859.
		Recovered.	Relieved.	Not Improved.	Died.	Not stated.	Total Discharged.	
TOTAL	7,708	35·6	9·9	8·2	19·6	·7	74·0	26·0
Under 1 month	2,209	50·9	9·7	5·8	17·8	·5	84·7	15·3
1 and under 3 months	1,505	45·4	11·3	6·5	19·5	·8	83·5	16·5
3 " 6 "	825	35·2	9·6	9·0	23·0	·7	77·5	22·5
6 " 12 "	575	28·9	8·7	12·7	24·9	·5	75·7	24·3
1 " 3 years	633	15·8	13·1	8·8	26·1	1·9	65·7	34·3
3 " 6 "	234	11·1	12·4	9·0	21·8	...	54·3	45·7
6 years and upwards	444	5·0	6·1	7·9	17·3	·4	36·7	63·3
Not stated	1,283	25·6	8·6	11·8	15·2	·9	62·1	37·9
Under 1 year	5,114	44·3	10·0	7·3	19·9	·6	82·1	17·9
1 and under 6 years	867	14·5	12·9	8·9	24·9	1·4	62·6	37·4
6 years and upwards	444	5·0	6·1	7·9	17·3	·4	36·7	63·3

NUMBER OF PATIENTS, 1ST JANUARY, 1860.				DEATHS DURING THE YEAR 1860.			
PAUPER.				From Suicide			
PRIVATE.		Total Lunatics.		Total Number.			
Total Number.		Number Recovered.		Total Number.			
Admissions during the Year 1860.		Total.		Total.			
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TABLE showing the Mean Population, Number of Patients treated, and the Deaths, in County and Borough Asylums, Hospitals, and Licensed Houses; also the Average Annual Rate of Mortality per Cent., and the Mean Term of Treatment of Patients, during the Five Years ending 31st December, 1858.

AGES.	Mean Population (=Mean of the Numbers on the Books on 1st January, 1854 and 31st December, 1858).			Estimated Number of Patients treated during the Five Years 1854-58.			Deaths of Patients during the Five Years 1854-58.			Average Annual Rate of Mortality per Cent. during the Five Years 1854-58.			Mean Term of Treatment, expressed in Years, of each Patient treated, during the Five Years 1854-58.		
	Males.	Females.	TOTAL.	Males.	Females.	TOTAL.	Males.	Females.	TOTAL.	Males.	Females.	TOTAL.	Males.	Females.	TOTAL.
	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.	Years.
All ages - -	9,460	10,765	20,225	17,678	17,974	35,652	6,269	4,821	11,090	13.25	8.96	10.97	2.68	3.00	2.84
Under 15 years -	110	77.5	187.5	266	172.5	438.5	38	22	60	6.91	5.68	6.40	2.07	2.25	2.14
15 and under 20	243.5	216	459.5	880.5	921	1,801.5	101	71	172	8.30	7.57	7.49	1.38	1.17	1.28
20	576.5	515	1,091.5	1,604.5	1,791	3,395.5	239	217	456	8.30	8.43	8.36	1.80	1.44	1.61
25	884	833.5	1,717.5	1,706	2,032.5	3,738.5	357	273	630	8.08	6.55	7.34	2.46	2.05	2.24
30	1,115	1,071	2,186	2,201	2,209	4,410	680	410	1,090	12.20	7.66	9.97	2.53	2.42	2.48
35	1,162.5	1,173	2,335.5	2,186.5	2,017	4,203.5	803	482	1,285	13.82	8.22	11.00	2.66	2.91	2.78
40	1,113.5	1,279.5	2,393	2,043.5	1,996.5	4,040	830	458	1,288	14.91	7.16	10.76	2.72	3.20	2.96
45	928.5	1,187	2,115.5	1,017.5	1,613	2,630.5	669	444	1,113	14.41	7.48	10.52	2.87	3.68	3.27
50	802.5	1,099.5	1,902	1,427.5	1,509.5	2,937	581	398	979	14.48	7.24	10.20	2.81	3.64	3.24
55	655.5	902.5	1,558	974.5	957.5	1,932	468	404	872	14.28	8.95	11.19	3.36	4.71	4.03
60	492	677.5	1,169.5	883	942.5	1,825.5	433	414	847	17.60	12.22	14.48	2.79	3.59	3.20
65	323	478.5	801.5	564	576.5	1,140.5	362	412	774	22.41	17.22	19.31	2.86	4.15	3.51
70 and upwards -	330.5	524	854.5	583.5	665	1,248.5	515	675	1,190	31.16	25.76	27.86	2.83	3.94	3.42
Not stated - -	723	730.5	1,453.5	650	570.3	1,220.5	195	141	334	5.34	3.86	4.60	5.50	6.40	5.96

Explanation of the foregoing Table.

The mean population is obtained by taking the mean of the number of patients on the books at the beginning and end of the five years, thus:—

Patients on the books on 1st January, 1854 .	18,195
" " " 31st December, 1858 .	22,255
	<hr/>
	2)40,450
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Mean Population .	20,225

The estimated number of patients treated in the five years is obtained by taking the mean of the numbers admitted and discharged during that period, thus:—

Patients on the books on 1st January, 1854 .	18,195
Patients admitted in the five years ending 31st December, 1858	37,682
	<hr/>
	55,877
Patients remaining on the books on 31st December, 1858	22,255
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Patients discharged in the five years	33,622
Patients admitted in the five years	37,682
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	2)71,304
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Patients treated in the five years	35,652

The average annual rate of mortality is obtained by dividing the deaths in the five years by five times the mean population.

The mean term of treatment of each patient treated during the five years is obtained thus:—

$$\frac{\text{Mean population} \times 5}{\text{Numbers treated in the five years}} = \frac{101,125}{35,652} = 2.84 \text{ years.}$$

ART. X.—UNRECOGNISED INSANITY.*

WE were consulted some years ago by an unmarried lady of about thirty years of age. She was healthy and robust in aspect, of strong, even masculine intelligence, which had been nurtured and directed by a brother, and her manners were calm and self-possessed. She had moved in a circle containing studious and thinking people, and had busied herself rather with the stern realities than the romance of our lot. She made the following confession. When passing by or near to a window in the street (and the plate-glass era had just commenced), she felt a strong inclination to break the panes: when in church and during sermon, but irrespective of its character and her devotional tendencies—she was pious though not a pietist—she was often impelled to shout, or shriek aloud: and when intrusted with the care of an infant, which frequently happened, she was invariably tempted to crush it, or dash it down upon the floor. This applicant was fully aware that these dispositions were superadded to her natural character; she regarded them as criminal or morbid; she could gaze at and, in a certain sense, speculate upon the impending ruin of her own mind; she concealed, repelled, struggled with, vanquished these impulses; and it was because the violence of her antagonists had increased and because the victory had become doubtful, that she sought medical aid.

Of the category to which this patient belonged M. Trelat treats. His thesis is to describe individuals who are actually insane, whose disease spreads greater misery and misfortune and over a wider sphere than less subtle infirmities, but who are not recognised as labouring under any form of aberration; whose intelligence and cunning are such as to cloak and conceal a substratum of hideous passion or perversity, or to defy and defeat the most probing and penetrating inquiries into their inner life; who combine talents, and energy, and acquirements such as dignify the highest understandings, with gross errors, absurd delusions, and irregularities of conduct; whose reasonable, and clever, and even brilliant conversation gives the lie, nevertheless, to lust, brutality, and degradation; and who come under the Royal definition of “never saying a foolish thing and never doing a wise one.”

Such an association must not, however, be confounded with the *Folie raisonnée*, for in it the capacity to reason is a part and a characteristic of the malady; in it the form and rules of reasoning are alone preserved, while the premises or conclusions are fal-

* *La Folie Lucide*: étudiée et considérée au point de vue de la famille et de la société, par le Docteur Trelat, médecin à l'Hospice de la Salpêtrière, &c. Ancien membre du Conseil de Salubrité du Département de la Seine: Paris, 1861.

lacious; in it a delusion is deftly and dexterously defended, or absurd inferences are logically drawn from inexpugnable data. In the class of cases which M. Trelat has described the disease is apart from, and in despite of, a healthy, or healthlike exercise of judgment; in these cases there run together two straight and unapproachable lines of sane thought and insane emotion or propensity. The treatise might, in fact, be defined—an exposition of forms of moral insanity in which the reasoning powers remain more or less intact. That it enters and occupies that debateable land which embraces the diseases of the Will and of Conscientiousness, and which forms equally the confines of criminality and disease, may be gathered from an analysis of the lucid lunatics who disturb and deceive society, and even the asylums to which they are ultimately consigned.

Among imbeciles and those of feeble intelligence, who are so curtailed and crippled mentally as to be incapable of meeting the dangers and difficulties of life, of discharging their social, family, and private duties; who are disqualified from becoming parents or managing their own affairs; there are individuals susceptible of training, of making vast acquisitions in science and art, who display marvellous constructive, musical, arithmetical talent, and who, under favourable circumstances, differ so little from sane individuals of low grade, as to form a class of enslaved and unpaid labourers in farms and elsewhere: who are denied the benefits, but subjected to the pains and penalties of responsible citizenship. The seduction, the prostitution, the marriage of these imbeciles are recorded. Rational satyrs and nymphomaniacs may be regarded as allied to imbeciles, as being likewise of contracted capacity, although gratifying inordinate appetite while in possession of principles which condemn and could overcome the tendency. Well educated children of twelve and fifteen become prematurely old under the dominion of sexual desires pursued openly, rabidly, in the home of parents. A lady, whose letters indicate great and educated ability and express affection towards her mother, attempts to seduce her father, almost ostentatiously, and, at all events, without a sense of sin or shame, and with a perseverance and ingenuity which savour rather of premeditation than of blind impulse. Wives living on terms of endearment and friendship with their husbands, of sparkling beauty and elegance, surrounded by luxury and splendour, organise “*parcs aux cerfs*,” or deliver themselves up to onanism; mothers of fair intelligence prostitute themselves and their daughters, and preserve to the close of life every appearance of propriety of deportment. We have encountered recently two instances in which men reputed sane, and who never otherwise outraged decency, had connexion with their own illegitimate daughters. It may be added that the

progeny were idiots. M. Trelat gives the following illustrations of astute monomaniacs, whom he warns us are the most difficult and dangerous class of the insane to deal with : a clever female declares that her head was sawn open by the soldiers of the revolutionary armies, and her moral sentiments extracted, and that she was thus converted into a vile and abject monster, incapable of thinking or doing good : a poor postmistress, compromised by mismanagement, and committed to prison, defends herself at once against the accusation of delinquency and derangement, baffles the repeated and prolonged inquisitions of experts, and composes voluminous expositions of her case, but at last betrays herself by writing in a scarcely visible hand at the close of one of these documents, "I am, we are rich," words which lead to the disclosure, that she believes herself the discoverer of the principles of all things : an educated person devotes herself to serious literary labour, which she pursues ardently, and solitarily, and painfully, but whose studies consist in a calculation how often the letter S, or T, or C, occurs in Genesis, Exodus, Leviticus, the Apocalypse, &c. ; how many pages in a particular edition of the Bible commence with D, how many with B, or how many conclude with T, N, or R : an ingenious inventor who ruined his family in attempts to discover perpetual motion, who, disregarding all ordinary motors, conceives that a current of water, nay, even stagnant water, will suffice ; and who experimentally, subjected to, and was capable of appreciating the admonitory refutation of Arago, in the presence of Humboldt, whispers, "Arago is wrong, my wheel turns itself." Defining erotomaniacs as instigated by a sentiment in contradistinction to nymphomaniacs, who crave physical gratification, our author adduces an instance of a lover committing suicide on the marriage of one of two sisters, both of whom he had loved with an equally intense attachment ; of a lady, who, reasonable in every respect, regulating the affairs of her household, acknowledging the merits of her husband, the tenderness of her relatives, cannot see the one, nor live with the others, because she is devoted to an imaginary lover, who lives in her heart but nowhere else, to whom she is constantly addressing herself and communicating her love by means known only to them.

Such self-deluders live in a state of constant exaltation and tenderness. They write their confessions : they moisten their effusions with tears ; they lose sleep, appetite, peace, they court solitude, they subject themselves to suffering and sacrifice as homage to the object of their worship ; and yet they may, to the ordinary observer, appear to display, in the transactions of life, sagacity and prudence.

Excessive jealousy is true insanity when it appears in man ; he abuses its authority in order to injure, torment, menace,

outrage and persecute the object suspected; he may maltreat, wound, murder; when in woman she weeps, cries, becomes excited and violent, and repels and repudiates where she should attract and delight. A sombre, jealous and vindictive mother accuses her husband of violating their youngest daughter; causes his imprisonment, and indirectly the madness of two of their children, but whose horrible suspicion seems to have constituted the only proof of her mental unsoundness.

M. Trelat is desirous of distinguishing drunkards as persons who drink when they have an opportunity of drinking, from dipsomaniacs, who become intoxicated when seized with the paroxysm. It is to be feared that this crux is too simple. In the first place, the morbid craving for stimulants is not always periodic or paroxysmal, but continuous; in the second place, the dipsomaniac creates opportunities for the gratification of his propensity; and in the third place, the phenomena of the tendency may be observed under a great variety of circumstances. It may coexist with the rarest gift of genius, it may be the shadow of the heroic faculties; and, although omnipotent in prostrating and dehumanizing all these attributes of the godlike, be the only speck, the only symptom of disease. It may be the sign of enfeebled or perverted volition. It may be the premonition of mania; the concomitant or consequence of dementia. It may be one of many indications of moral debasement. It may be initiative of optimism in general paralysis; as if the mind potentially foreshadowed its ultimate morbid growth; or sought an immediate realization of the gloomy glories in which imagination is to indulge and expire; or it may be the culmination of a long course of excess and excitement in involuntary and uncontrollable appetite. But although acquired, it may be hereditary; it may appear in childhood, it may be sudden, impulsive. Under all forms it is regarded as all but incurable. The erection of a vast hospital for the treatment of such cases in America, of which, it is averred, thousands desire to become inmates, would indicate that such a discouraging opinion is not universally entertained; and we have grounds for believing that were this propensity recognized and treated as a disease, and were treatment based upon the removal of the physical conditions upon which it so often depends; upon abstinence, and the establishment of new habits, pursuits, and associations, persevered in for a sufficiently long time, it would be found as amenable to such remedies, and as eradicable as other forms of unhealthy impulse. M. Trelat furnishes the familiar example of a youth of promise concluding a complete course of education, which qualified his brothers for excellent appointments, by delivering himself over with fury to the abuse of stimulants, which no advice, no reproach, no prayer, no threat, no authority, no

exposure could arrest or alleviate; who converted everything, even his pantaloons, into brandy; upon whom the prison, the asylum, the ministrations of the priest and the physician produced no impression, and who, although he manifested that insensibility to truth, and rectitude and self-respect which is so frequently the characteristic of the confirmed dipsomaniac; after a debauch of twenty years retained unimpaired his recollection, his precision of language, his promptitude in conversation, and many of his acquirements.

Prodigals and adventurers are often clever fools. The motives may be pride, vanity, ambition, but ruin is entailed on the pursuit of gain, and profound policy and selfish purposes may be pleaded in justification of ostentation and profusion. G. is represented as young, fair, highly cultivated, of elevated tone and agreeable manners. She marries, is loved, trusted, and renders her home attractive, both by its decorations and comforts, and by her own manners. It is, however, suddenly discovered that she has indulged in the most lavish expenditure; that, without consideration of her husband's means and situation she has not only spent every shilling, amounting to enormous sums, which was entrusted to her; but that she has involved herself in debt. Carried away by the desire to possess, to buy or expend, she has ordered furniture, dresses, lace, jewellery, which were no sooner in her possession than they were disposed of at a low price, which was again laid out in the purchase of similar and perhaps more extravagant services, stuffs, and gems. In the more advanced stage of the disorder she bought everything, and during one morning secured 2000 francs worth of lace, which she sold for 500, in order to procure a supply of champagne, which was disposed of for a fourth of its price before it reached her cellar. She passed into ambitious mania; her child was idiotic.

Of morbid pride, veiled or relieved by qualities which are accepted as expressions of natural or justifiable principles of action, one illustration may be sufficient. M. N., although young and vigorous, always uses a cab, even in fine weather. He is surrounded by sources of happiness; but his gentle and loving wife, and his children, see little of him, even at the appointed seasons of family reunion. When he invites his friends, he receives them at a restaurant. He has an income of 40,000 francs; but his family enjoy none of the comforts or indulgences of affluence. His means are invested in enterprises such as whale fishing, mining, draining, and the construction of canals. He borrows money from speculators, who boast of doubling or tripling their capital. He is neither manufacturer nor merchant, but opens a credit in various banking houses by profitless transference of his funds. If his customary activity

were to relax, were he to give fewer dinners, or squander less money, his credit would suffer. He is therefore the busiest man in the world. In proportion as his speculations fail, or his creditors press, he increases his bustle, and the circulation of his stock. He seeks occasions of profuse expense, in order to maintain and extend his credit. The friends to whom he is indebted conceive that his resources are ten times greater than their own. Ruin merely suggests sacrifices in order to conceal the losses which have taken place. His dissimulation and efforts to conceal his real situation were so successful that, on the eve of his departure, never to return, his credit was good. Even his emigration was dictated, less by the fear of the bankers, than of his friends, whose capital he had employed, not in the pursuit of pleasure, but in order to continue to appear rich. Now, a teacher of languages in a foreign country, his malady is uncured.

There are criminals who do not come within the operation of the legal code. Notwithstanding this immunity, they create greater evil and suffering than the ruffian or the robber. They are conspirators, intriguants against the happiness and wellbeing of society; their arm is against every one; they are false, insincere, mischief-making, but so adroit and expert as to escape the consequences, even the suspicion, of their treachery. The motives for such a course, inexplicable to pure minds, appear in many cases to be merely the triumph of cunning over the innocent and trusting, the disorder and distress which they produce, and the feeling of insecurity which their machinations inspire. Under certain circumstances the disposition they manifest assumes a more practical form. They destroy property in place of confidence, and ruin fortunes as well as reputations; but do so with a superficial sagacity and decorum; and so indirectly as to obtain credit where they merit punishment.

The thieving propensity, which is developed so frequently in extreme youth, and during the most careful judicious culture, is encountered in mature life, in the ripened understanding, and associated with fascinating manners. Kleptomania is generally evinced by the appropriation of articles of no value, in such numbers as to be useless, of a size or nature as to render detection inevitable; but it would be unsafe to infer that the man who steals money and applies it to his own gratification, is therefore insane. He who, in open day, or with a full purse, picks the pocket of his friend, and then bestows the spoil in charity, is as insane as the imbecile who abstracted thirty leagues of black-pudding, and as great a length of sausage as would supply a country. A man of limited intellect, but belonging to an enlightened circle, and who managed his own affairs prudently and profitably; keeps three establishments in Paris; and explains

this unusual arrangement by the assertion that he does not relish walking in the streets at night, and that he occupies one or other of these residences, as he may visit in the vicinity. He mingles much in good society, travels, visits watering-places, and wherever the rich and gay most do congregate. His sudden death reveals that each of his apartments are filled, crammed, with sheets, towels, handkerchiefs, vases, umbrellas, pictures, plate, jewellery, &c., which in thirty or forty years he had taken from the houses which he frequented, the friends whose intimacy he had enjoyed. No profit accrued from these thefts; the objects had been turned to no use, and were restored, so far as possible, to their owners. He lived and died unsuspected. A well-educated woman, the mother of a large family, carried on her household so comfortably and elegantly as to excite the astonishment, as well as approval, of her husband. He could not conceive how his limited resources were so judiciously managed as to secure the luxuries by which he and his children were surrounded. Her financial explanation was that by economizing useless and trifling indulgences she could afford to be extravagant; but, after years of impunity, the secret was detected. She was a wholesale plunderer, who had purchased none of those articles which excited the admiration and envy of friends and foes.

It would be superfluous to swell this catalogue by giving examples of the suicidal tendency, coexisting with perfect lucidity; of its being the only symptom of disease; of its forming the sequence of a clear and rigid train of reasoning; or of its being harboured for years, during active and successful pursuits, in minds of apparent strength and integrity, and amidst scenes of mirth and enjoyment. M. Trelat signalizes various curious modes of self-destruction; and in alluding to that by abstinence, states that to Esquirol we owe the great and ingenious idea of conveying nourishment into the stomach, without, and in opposition to the will of the recusant.

It is well known to psychologists, that the most profound stupor, and immobility, and taciturnity may cover faculties of ordinary range, capable of training and exercise. It occurs occasionally that a mere breathing carcase, which lies inert and insensible, which has resisted affection and education, which gives no sign of relation to the external world, of hearing, or seeing, or knowing what is going on around, actually possesses this cognizance; and has been quickened and roused to mental life by a powerful physical impression, such as the shower-bath. Even amongst maniacs there sometimes exists the power of controlling the manifestations of their malady, postponing the paroxysm. For years the world is ignorant of the wild passions which lurk beneath a placid and polite exterior; they engage in business

they pay and receive visits, they contract friendships; they may be successful, while their fury is exhausted in solitude, or in the bosom of their family. They may exercise intelligence during the access of excitement; seek the retirement, or adopt the measures which may be required to deceive and protect society; or travel, as was the case where this infirmity was the concomitant of genius, with a strait-jacket in the pocket.

That there are irresponsible and morbid, but intelligent murderers, thieves, evil makers mingled with the sounder elements of society, polluting its purest sources, desecrating the holiest shrines, cannot be denied. That these conspirators against order and harmony are almost, or altogether, madmen is highly probable. But it still remains to be solved—and M. Trelat has not brought us nearer to the solution—whether the mischief and misery caused by such men result from original, indomitable instincts, or so powerful, as to resist all the restraint supplied by the laws and influence of the mind in which they arise, or of the society which they disturb; and whether these instincts be common to all men or characterize the individual, or should be traced to the feebleness of that intelligence which should indicate the consequences, or to the non-existence of that moral sense which should recognise the nature and the relations of the act. There is, unquestionably, disease in each of these conditions, in the inordinate appetite which sets reason and religion at defiance, as well as in the effeteness and insufficiency of conscience and intellect in subduing or extinguishing a passion which is not inordinate. The law, however, as yet admits only intellectual, not moral dementia. Many physicians are too ignorant, or too pusillanimous, to go further. Were it admitted, a very low degree of self-examination would necessitate the admission, that in every act there are involved three distinct elements, the impulse or will, the motive and the perception of effects, and that without the equipoise, and harmony, and fair and full exercise of these principles, no proceeding can be regarded as healthy and spontaneous, the inquiry might be greatly facilitated. Is an act which a man has no purpose in performing, does not intend, or imperfectly intends to perform, and does not understand, his own act? or is not the act a part of his nature? An epileptic gouges his eye out with his own hand, during the irregular and vehement muscular contractions, or exercises of volition, which precede, or take the place of a convulsion; but though the arm was directed and moved by an effort of will, the object was not purposed nor mentally co-ordinated, and the act must be viewed as only partially willed, and as antagonistic to the whole or healthy mind.

How are individuals so influenced to be detected; and intercourse, and social ties and marriage with them, to be avoided?

Those described by M. Trelat, or most of them, were treated as lunatics; but the recognition of their actual condition was generally subsequent to the consummation of calamitous connexions, of marriages entailing wide and ever-spreading wretchedness, and to the public display of some of the more loathsome forms of morbid appetite. As evidence of the magnitude of the evil which he wishes to meet and mitigate, M. Trelat shows that of seventy-seven cases which form the illustrations of his work and in which there remained a certain degree of sanity and self-control, forty-three were demonstrated to belong to tainted races, or to have had members of their family unequivocally insane; while of the same number fifty-one were married and had descendants more or less threatened with a similar fate.

Except in affording most startling proofs of the proposition which he has undertaken to establish, but which had been previously admitted on all hands, and in presenting the carefully prepared results of a long experience, M. Trelat does not appear to have supplied an answer to the question proposed, nor to have suggested other than admonitory expositions of the nature of the process of degeneration going on. He writes, "*Qu'on émancipe les forts, qu'on protège les faibles :*" but the difficulty consists not in carrying out the noble sentiments, but in the discovery of means by which the feeble, the vitiating and emasculating elements of society are to be recognised and eliminated. The concealment of insanity is itself a symptom of insanity; and even that self-control which subdues the exhibition of passion and perversity, although perhaps deriving influence from the strength created by nervous disease, is so near akin to the highest virtues, the noblest exercise of moral discipline, that, with our existing knowledge, it will be difficult, if not impossible, to determine the exact limits of healthy mental action. M. Trelat seems conscious of the difficulty which must be encountered in admitting the existence of "*rational fools*," while qualifying his selection of the phraseology employed. He says, "*these patients are fools, but do not appear to be fools because they express themselves with clearness. They are fools in their acts, rather than in their words.*" This attempted definition would include a very large proportion of the inmates of our asylums;—but there is an obvious fallacy, the fallacy of selecting one phenomenon as indicative of health, in calling that individual "*perfectly lucid*" who merely speaks coherently or rationally, and comports himself decently on certain favourable circumstances; but who when tried and tested, affords undubitable evidence of insanity.

This treatise must be accepted as a fragmentary chapter in the lifelong experience of the author; as part of a larger work which he seems to despair of completing. It is to be earnestly desired

that the apprehension so pensively but naturally expressed in the preface, may not be realized; and that medicine may be still further enriched by the systematized observation of so able and philanthropic a psychologist as the contribution under consideration proves M. Trelat to be. As directing attention to the origin and early history of a class of cases which are rarely met with except in their last stages; as collecting together a large number of examples of the various forms of moral insanity, in which intelligence is preserved, if not intact, unobscured, the present volume is highly valuable.

ART. XI. — ON HALLUCINATIONS IN THEIR RELATION TO MEDICAL JURISPRUDENCE.

By A. BRIERRE DE BOISMONT.

[THE following article is a translation of the terminal chapter in the third edition of M. Briere de Boismont's work on Hallucinations,* just published. On the merits of this classical and widely-known work it would be idle for us to dilate. In the present edition it has been entirely re-written and re-cast, and its value proportionately increased. We have thought that we should most gratify our readers, as well as best indicate the nature of the modifications which the work has undergone, and its augmented excellence, by translating certain portions. We are induced to select, first, the chapter on the medico-legal relations of hallucinations, because the author has himself published it in a separate form, with certain additions (chiefly consisting in the illustrative cases being detailed at greater length), in the last number of the *Annales d'Hygiène Publique*.—ED.]

A PHENOMENON demonstrated in about three-fourths of our observations—since we have noted it 725 times in 1146 cases—the distinctive character of which is to convince of its reality those who experience it, and compel them to accord more confidence to the creations of the imagination than to the impressions furnished by the senses, necessarily presents some interesting subjects of medico-legal study. It is easy to conceive that the conscience and free-will have no longer then, as in the conception of delirium, the same chance of successfully struggling against error. The senses, subjugated by false impressions, which are com-

* *Des Hallucinations, sur Histoire Raisonnée des Apparitions, des Visions, de l'Extase, des Rêves, du Magnetisme, et du Sonambulisme.* Par A. Briere de Boismont. Troisième Edition, entièrement refondue. Paris : 1862.

pletely identical with them, have no power over the insane, who almost invariably replies to objections by these words of Bayle's patient:—"How are we to judge things? By the impression they produced. Well, I believe in the existence of demons, because I have seen, heard, touched, and felt them."

The surest means of studying hallucinations for legal purposes is to pass in review the symptoms of the principal forms of insanity, because they show us the direction of ideas and the line of conduct into which the insane are carried away.

The importance of this study has already been indicated in the chapter occupied with the description of hallucinations associated with the principal types of insanity, and in the different cases contained in our work. People begin to understand now that many of those extraordinary actions that were unhesitatingly set down to the account of crime ought to have been attributed to madness, and especially to hallucination. This opinion will become a truth when the conviction is established that independently of fantastic images, forms of persons and objects undergo the most astonishing metamorphoses, that voices exercise a despotic power, and irresistibly compel the will to obey their orders, &c.

Such a subject is of too much interest not to have a special chapter to itself. We will examine, 1st, the influence of hallucinations upon the conduct, sleeping and waking. 2nd. We will afterwards discuss to what extent hallucinations necessitate sequestration, suspension of civil rights, and whether this disposition of mind always nullifies civil acts.

We have already said that the starting-point of this subject ought to be an examination of the symptoms which have a close connexion with legal questions, and we shall confine our investigations within that circle.

In acute delirium, the violence of the symptoms, the continuousness of the intellectual disorder, the incoherence, and the confusion, render it difficult to separate hallucinations from illusions. Abandoned without control to external impressions and internal sensations, the brain is forced to submit to them and be mastered by them, the judgment being wholly wanting. Out of 32 cases of acute delirium 25 were complicated by hallucinations and illusions: the others were so disordered that it was impossible to inquire into them.

This kind of febrile maniacal madness by the intensity of the general agitation confuses all the brain; ideas take bodily shape, objects undergo a metamorphosis, and the mind lives in the midst of a continual phantasmagoria.

The hallucinations and illusions in this disease are the accessories of a delirium nearly always general, in the midst of which

it is by no means rare to see a predominating delirious conception ; but the mobility, confusion, and clashing of ideas often render difficult the observation of these sensorial perceptions. It is undoubtedly one of the forms of insanity in which they are most fugitive. The impressions they produce upon the mind are often painful ; every form seems that of an enemy or of a demon, voices utter threatening words ; beverages have a filthy flavour, or are poisoned. Five of these lunatics, under the influence of such sad impressions, attempted suicide, and two rushed upon persons present to do them an injury.

It is to this sad condition of the mind that must be attributed the suicides so frequently resulting from what are called cerebral or ardent fevers, and which are generally only cases of acute delirium.

Persons of this class ought to be the object of constant surveillance, owing to the variety, the mobility, and the suddenness of their illusions, which are more common than hallucinations.

The agitation of the *maniac*, his want of attention, the mobility of his ideas, are so many circumstances which interfere with the observation of sensorial impressions in this form of madness. Nevertheless, the longer interval between the intermittences, the species of connexion faintly visible between the incoherence of the conversation and the extravagance of the actions, the frequent presence of the patient, allow the disorders of the senses to be studied more attentively than in acute delirium.

The observations we have made upon mania amount to 229, and those complicated with hallucinations and illusions number 178 cases ; there remain 51, which did not exhibit false sensorial perceptions.

The 178 facts are thus classified :—

Hallucinations	54
Hallucinations and illusions	64
Illusions	60

178

Hallucinations and illusions of mania give occasion to important observations. Marc, in his *Traité de la Folie Judiciaire*, strongly directed attention to this subject. It may be said, he affirms, that the majority of the extravagant, singular, reprehensible, dangerous, and criminal actions of the insane, arise, in the greater number of cases where they appear inexplicable, from hallucinations and hidden illusions.*

Out of 178 persons who presented this complication, 30—under the influence of false sensations—threatened death, struck,

* Caspar, *Traité Pratique de Médecine Légale*. 1861. 1^o vol.

overturned, wounded their pretended enemies, attempted to kill themselves, and if deplorable accidents did not take place, it was simply because they were promptly placed under restraint.

Hallucinatory perceptions and illusions of hearing lead to quarrels, to extreme anger and fury, and to violence, in considerable proportions. One of our patients, to whom insulting words were addressed, flew each time into a violent rage; he exclaimed that there had been enough of it, and that he must kill somebody. This patient is all the more dangerous because his attacks are instantaneous. Were he not constantly accompanied by his servant, some accident would have occurred; yet, despite his excitement, he knows what he is doing. However strict may be the surveillance, these auditory illusions constantly occasion struggles between the insane, and more or less serious injuries. A merchant used to hear two voices; one polite, the other insulting. With the former he was amiable, cheerful, ready to oblige; but when it was the turn of the latter, he became formidable—his strength, already great, was doubled. During one of his crises he seized, in an instant, a stake, and he had to be surrounded before it could be taken from him. Life is often endangered by this kind of illusion. Two ladies unexpectedly flew at a female employed on the establishment, and attempted to murder her; a vigorous struggle became necessary. A patient, insulted by these voices, threw himself out of the window. We attended once a merchant, in whose ears the word *bankruptcy* continually resounded. He energetically protested against this insult, and would have committed suicide had not precautions been taken.

We are certain that this kind of illusion, like that of the hearing, might have been the cause of quarrels, of violence, and of duels.

It has been seen in the chapter upon the hallucinations of mania, with what frequency persons are metamorphosed in the eyes of the insane; for, out of 124 cases, we have witnessed this change 62 times. This false sensation leads to deplorable consequences. A person, a prey to this delusion, flew at a friend, whom he took for a thief, knocked him down, thrashed him soundly, and called him a scoundrel. In our establishments, patients are often seen who try to beat other inmates whom they consider enemies. We attended a maniac who, believing himself surrounded by malignant beings, continually wished to rip up his companions. Many of those confided to us had struck policemen and others, because they had assumed the form of enemies: for the same reason some lunatics beat their keepers and severely wound them. One had his face mutilated by a decanter; when assistance came he was blinded by blood, and could not defend himself. Another keeper received upon the head a blow from an

iron bar that a maniac had torn from the window of his cell; for some moments his life was despaired of.

The number of accidents is diminished by the fact that the forms seen are those of imaginary beings, who, having no living basis, excite the rage of the insane, and lead them into fantastic struggles, but occasion no disaster. A lunatic believed himself assailed by little demons brought in the air; they tortured him, poisoned his food, disseminated infectious smells, injured his eyes, shouted in his ears, and pinched his skin. At first he tried to exorcise them; but as his prayers were useless, he became furious, slashed at them with everything that came to his hand, and did not cease until exhausted by his superfluous efforts. If imagination had substituted human forms for these demons, murder might have occurred, as in many other cases.

The hallucinations and illusions of touch are also the starting-point of complaints, of recriminations, of acts of violence. The lunatic who imagines he has been struck is only too ready, if irritable and excitable, to give back, at some slight inconvenience to himself, the blows he thinks he has received. With women, sexual illusions demand the utmost attention. One of our patients declared she had been violated by the physician of the establishment, a political refugee—a man of the most honourable character, and who had an invincible repugnance to the insane. This patient made several complaints to me on the subject. The idea had seized upon her mind; she believed in it firmly. A year after quitting the establishment she came to me to repeat her denunciation; she was with a person who appeared to have taken the matter seriously. When they had related the facts to me, and I understood the object of their visit, I declared to them that I had no explanation to give, and referred them to the Procureur-Impérial, insisting upon this point: that an affair of such a nature did not allow of compromise, and that justice alone could decide it. The matter went no further. It is necessary to be on one's guard against these accusations, for though imaginary, they are not the less disagreeable for all that. The best plan is never to see young women, except in the presence of a servant; and when they have erotic instincts, they ought not to be visited or spoken with except in the presence of other patients.

The illusions of smell and taste often make maniacs suppose that their food and drink are poisoned, that they contain arsenic. Food and drink are therefore refused. Several of our patients, under the influence of this idea, have attempted suicide.

The general character of sadness, terror, despair, &c., found in the hallucinations and illusions of *melancholy monomania*, only too often foreshadow deplorable consequences. Out of 303 observations, which form our total returns of this kind of madness,

we have noted 248 cases of hallucinations and illusions, of which 212 presented the most morbid indications of sorrow : suicide, it will thus be seen, is the accident most to be dreaded.

The actions resulting from these painful sensations may be divided into two classes : 1st, attempts at suicide ; 2nd, attempts against others. Authors who have affirmed that suicide was always an act of madness take their arguments from lypemania (melancholic monomania). This form of delirium, which constitutes one of the most determined types of mental derangement, presents out of its 303 cases 170 instances of ideas of or attempts at suicide, and 118 refusals of food. We take into account here only 248 cases of melancholy madness with hallucinations and illusions. The two classes indicated are thus subdivided :—

1st. Attempts at suicide	144
2nd. Attempts against others.	52

This proportion is considerable, since for the suicides it exceeds half of the total (172), and for the attempts against others it reaches nearly the fifth (476).

The motives given by the hallucinated for attempting suicide spring mostly from the painful sensations which oppress them. They unceasingly hear the voices of their enemies, of malignant persons who overwhelm them with reproaches, insults, threats, accuse them of having committed crimes, frightful sins, of being dishonoured, ruined, lost. One whom these reproaches drove to despair asked us to let his servant be always with him, for fear he should do himself an injury. One day, when the servant's back was turned, the patient dashed himself head foremost against the looking-glass that he smashed to atoms, falling senseless upon the floor, his skin torn in several places, and a small artery opened. Attended to and consciousness restored, he told us he had seen in the glass two dogs ready to devour him, and to escape this torment he had determined to finish with it at once. This spontaneity of determination is often so rapid that it can be neither foreseen nor prevented.

A young lady, to whose case we have already referred in the symptomatic exposition of hallucinations and illusions of acute delirium, was admitted into my establishment for acute delirium, with repeated attempts at suicide. Two keepers were placed by her side, and never quitted her. She had been to bed about two hours, and was very quietly conversing with the female inspector, when, suddenly seizing the cord of the curtains, she tied it so tightly round her throat, burying her head at the same time under the pillows, that for an instant the worst was feared, and for several days she bore the marks of the cord.

While rendering justice to the *non-restraint* system of the eminent Dr. Conolly, we have found it impossible of application in cases of this kind; and we would cite the case of a young person who, treated according to his principles, found means to obtain possession of a piece of glass, made a jagged wound in her arm near the vessels, and was sent away from the establishment that its method might not be deviated from, and because it was feared that some unfortunate occurrence might happen. If the strait-waistcoat had been employed—despite the supplications of relatives—in an establishment under my inspection, upon the entrance there of a female patient who had permanent suicidal mania, and to whom I had allotted a special attendant, I should not have been cited before a tribunal for a lunatic suicide, a circumstance without precedent until then, and I should have avoided a demand for damages that I might have set aside, but which I preferred to satisfy, in accordance with the fashion of the day. Nevertheless, it may fairly be stated that the sword of Damocles is suspended above the heads of directors of lunatic asylums.

A vision may at any moment provoke this thought. We have related one example; here is a second. Talking with a lady suffering from hallucinations, she told us she had just seen her funeral pass, and added, "But for the fear of scandal, I should have made the illusion a reality." The suicide in this case could not have been foreseen, and the determining cause would have remained unknown.

Dr. Baumes, medical director of the asylum of Quimper, states in one of his reports that a man was brought into his establishment in consequence of a sudden hallucination, which had had a deplorable result. All on a sudden a voice cried out to him, "Kill your wife," and he instantly shot her dead with a pistol. Scarcely was the act committed than the hallucination disappeared, and he no longer had delirium. An investigation took place, and the feeling was strongly against the murderer. Doubts existed, however, and a medical examination was ordered. The jury decided, despite the Procureur-Impérial, that the accused was not in a responsible state. He was sent to the Quimper Asylum. For a year the most minute examination discovered neither hallucination nor delirium; when, at a moment in which it was least expected, he jumped from a second storey and dislocated his left shoulder. Just before a voice had been saying to him, "Throw yourself out." When we saw this patient, in passing through Quimper, he was once more calm.* It is evi-

* A. Brierre de Boismont, "*Une Visite en Bretagne à l'asile Saint-Athanase; quelques mots sur la Vie à l'air libre.*"—*Union Médicale*, note 403. 1857.

dent that, in this case, the character of duration that Dr. Brossius considers fundamental was entirely wanting in the hallucination: we think with M. Renaudin that this phenomenon in analogous circumstances is the product of various modifications of the somatic state, and in particular of the general susceptibility which constitutes its gravity and irresistibility.*

Every one must have remarked that painful and melancholy ideas sometimes suddenly arise in the mind, and remain there with strong persistence. You drive them out; they return. We knew a man who fancied that his house was going to catch fire; he was astonished at this idea, and could not divine its origin; it ceased, reappeared, tormented him for several days, especially at night, compelling him then to rise, disappeared, and showed itself afterwards at long intervals. It has existed for some years: he takes it for what it is, no longer troubles himself about it; but he has observed that it grows more intense when he is put out, and when he is not very well. This is not an isolated fact, and we do not hesitate to say that it prevails among many people. This singular state is especially common to nervous people. If by any course the idea is not repelled, it chooses its abiding place, and may perhaps subject the organization to its despotic power. The irresistibility of certain ideas is proved by a thousand examples. Every medical man has heard the hallucinated declare, "I am compelled to do that; a voice commands me to strike." It is unquestionable that these false impressions form a marked proportion in the statistics of suicide collected every year by the administration of justice.

The suddenness of the hallucinations is sufficiently established by the examples we have just cited. The annals of science contain many others. When they do not occasion extravagant acts, they fail to fix the attention so much; they even pass unperceived, or are observed only in special establishments. But when they are the cause of a crime, judgment should not be hasty; all the particulars which may throw a light on the circumstance ought, on the contrary, to be examined. There are some hallucinations, like homicidal impulses, which exhibit themselves unexpectedly, without having been announced by any derangement of the mind. Knowledge of antecedents may often point to madness; singularities and eccentricities augur badly for the integrity of the reason; assumption becomes stronger if some strange act at a previous period can be ascertained. Changes of disposition and of demeanour are of extreme value; investigations into hereditary character in such circumstances are also very useful; the motives of action, the replies of the person inculpated, should be

* *Annales Medico-Psychologiques*, Janvier, 1854, 3^e series, t. ii. p. 109.

the object of serious examination. When the person questioned replies that he obeyed a voice; that he was irritated by insults unceasingly bestowed upon him; that he wished to be revenged upon his persecutors—then, if the victim was unknown to him, or if he had been on good terms with that victim, and if it is found that no connexion of any kind exists between them, assumption is of still greater value. Correspondence must not be overlooked, the character of the handwriting, capital letters, underlined words, often throw much light upon an action which appears incomprehensible.

Isolated hallucination, unexpectedly developed, often shows itself with symptoms that enlighten the investigator. There is something wild, unusual, restless, rapid in the eyes, the speech, the gestures, the actions, which indicates that the person is not in his normal state. Nearly always the functions work badly. These facts show that it is not easy to simulate madness and hallucinations.

If doubt exists, isolation must be insisted on, and nearly always, as in the observations of M. Bourne, after a more or less lengthy detention, evident symptoms of insanity dissipate all uncertainty.

Thoughts of ruin, of persecution, &c., have several times been the cause of a class of suicide difficult to prevent. The hallucinated, who are under the impression of these menaces, step by step reduce the quantity of their food. Three of them persisted in doing this for six months. Every patient of this kind, who was not attended to from the first, died in a state of skeleton-like thinness.

A man employed in a tobacco manufactory began by reproaching himself for embezzlement. He struggles against this idea, but it will not quit him: he thinks, then, that he sees at every instant the police around him, who come to hurry him away to the scaffold. Wishing to spare his wife this shame, he remained an entire night while she was asleep with the razor at his throat. Fortunately the thought changed; perhaps he yielded to a gleam of reason, to an instinctive movement of affection; he threw away the deadly instrument. The next day he was brought to the establishment in which I was physician. For two days he had been unceasingly pursued by the same vision. I had just quitted him, when in about a quarter of an hour he was found drowned in a small garden tub, from which he was extricated with difficulty. If this man had cut his wife's throat, and killed himself afterwards, the cause of this fearful tragedy would have been attributed to any but the right motives.

Accusations of theft, of abuse of confidence, of perjury, and voices addressed to the hallucinated have frequently led to

avowals from them. "It is true," they admit. Fresh facts I have to add to those we have published to prove that remorse may be a determinating cause of madness and hallucination. A tradesman who until then had deserved the esteem of all who knew him, heard voices reproaching him with a bad action. These voices left him no moment of repose: his family and friends were prodigal of consolation. I was called in, and tried to tranquillize him; everything denoted coming calmness. He went up-stairs to go to bed. A few minutes afterwards he was found hung.

Among the hallucinations which occasion suicide, those must not be forgotten which take a religious shape, such as apparitions of the devil, of the flames of hell, of voices which speak of sins committed, of damnation. We have attended several of these unfortunate persons, among others a Greek lady, who fancied herself condemned to eternal fire; their lamentations, their cries, their howls, will never be effaced from our memory. One fact especially struck us—the horror they felt towards churches; violence would have been necessary to make them enter one. Many of these lunatics would neither fulfil their religious duties nor pray.

If, in the majority of cases, mournful impressions are the cause of suicide, it sometimes happens that the melancholic monomaniacs kill themselves when there is no connexion between cause and effect. Thus many persons, suffering from hallucinations, have thrown themselves out of window, because a voice called them. A lady who fancied she had a serpent in her stomach wished to extract it by means of an incision made with a pair of scissors she begged to have lent to her.

Lunatics are not only dangerous and hurtful to themselves, but equally so to others. Long would be the list of spoliation, ruin, and murder of which they have been the authors. A short time since, in my note, "*Sur la perversion des facultés morales et affectives dans la période prodromique de la paralysie générale*,"* I cited the case of a lunatic who had just lost 800,000 francs, ruined his wife, and left five children to the charge of his father-in-law. The action, in connexion with the lunatic who blew out his brains after having torn and thrown into the fire thirty-four notes of a thousand francs each to prevent his wife from inheriting them, is still fresh in the memory. Quite recently I made many useless attempts with MM. Parchappe and Baillarger to

* A. Brierre de Boismont, "*Etudes Médico-légales sur la Perversion des Facultés Morales et Affectives dans la Période prodromique de la Paralysie générale*." Lues à l'Institut de France, le 24 Décembre, 1860.—*Annales d'Hygiène et de Médecine Légale*, 2^e série, tom. xiv., p. 224. 1860.

learn from one of my patients where he had hidden his deeds and his money.

The acts comprehended in the second section are to the number of fifty-two. Of these many consist in menaces or attempts which the originators, according to the legal expression, could not accomplish, owing to circumstances independent of their will, prevented as they were by confinement and surveillance.

In order clearly to understand the slight barrier which separates the ideas of delirium from their execution, we will analyse ten cases, in which are carefully noted the orders given by voices to the hallucinated. They are commanded to do such and such things; to go to the right or to the left; to go out without motive, and while thoroughly appreciating the inutility of these orders are forced to obey. A very pretty, gentle, and well-educated young girl, of religious principles, heard a voice which told her to quit her home. For several days she could not be found. It was vaguely known that she had taken refuge in a forest. These flights having occurred three times, her family, in very natural alarm, brought her to my establishment. Her condition improved. She was able to return home, but another disappearance necessitated fresh restraint; she is now mad. This wandering mania is common enough; it is especially observed among melancholic monomaniacs, who believe themselves pursued by their enemies, think they are being poisoned, &c. One of these frequently changed his lodgings to escape these imaginary attempts, and took his meals every day in the most remote eating-houses—some eat only what they themselves have bought or obtained by stealth.*

Voices compel the hallucinated to keep silence, to repeat their words, to climb trees,† to puff and blow instead of reading; and if observations are addressed to them on this conduct, they answer that they are compelled to act thus.

In place of these orders, futile, ridiculous, and without importance, the voices command reprehensible, dangerous, and criminal actions.

A rich man who lived alone in a house was obliged to sell it; he was completely ruined. Some time afterwards this man, who had long suffered from hallucinations, had a lucid interval, in which he declared he had sold all his property, and thrown the money into the well of his former dwelling, at the instigation of voices which commanded him to do so—(a fact already cited and communicated by Dr. Baron, physician to the Enfants de France).

* See chapter on Melancholic Monomania.

† We are citing special facts; it will be obvious that these determinations may vary infinitely.

A clerk, about thirty years of age, was brought eighteen years ago to my establishment in the Rue Neuve St. G  nevi  ve. It was suspected that he was simulating insanity. The house in which he was employed had discovered an embezzlement of about twelve thousand francs, respecting which he could not or would not give any information. Three hours after his arrival he threw into the fire a set of chimney ornaments. I asked him what had induced him to commit such a foolish action ; he was some time before replying to me ; then he said in a low voice and in a mysterious manner, "He commanded me to do it." From that moment it was impossible to get a word out of him, and he ended by falling into a state of complete insanity.

It is by no means rare for voices to impose upon the insane complete dumbness. There was one in our establishment who was seven years without speaking ; and we have another who for two years has declined to say anything to us.

The conviction of the hallucinated as to the reality of these voices will explain these acts. It must be remarked that they yield to a superior strength, as the replies of the majority demonstrate in the most conclusive manner. It is difficult, in fact, to believe that the patient we saw in consultation with MM. Michon and Moreau of Tours, who puffed when we begged him to read, and said he could not help it, would not, under the same impulse, have set fire to his room, or struck down one of us, as he afterwards did.

The acts committed by hallucinated lunatics are often the consequence of an order they receive through the voice of an invisible being.

A cavalry officer, whom we had for twenty years in our establishment, and who was a most gentlemanly man, but full of eccentricity, had killed, under the influence of one of these hallucinations, his colonel at the head of his regiment.

Dr. Botten, formerly physician-in-chief to the Antiquaille Hospital at Lyons, relates, in his essay upon hallucinations, the case of a melancholic monomaniac, several years in that establishment, who had strangled his daughter in obedience to a voice which commanded him to suspend her respiration.

The following fact is in the *Journal d'Hufeland* :—"A Prussian peasant thought he saw and heard an angel which ordered him in the name of God to sacrifice his son upon a pile. He immediately ordered the son to take some wood to a certain spot. The son executed the order ; his father laid him upon the pile and killed him. He was the only son !"

A man heard one night an internal voice which said to him :—"You must now kill your child." He rose, resisted the horrible

thought, and went to bed again. Scarcely two or three minutes had elapsed when something unknown repeated to him more imperatively than at first, "Instantly kill your child." Arming himself with a hatchet he killed the poor little one.

In an examination that took place some time afterwards, he declared that twice before he had had the horrible idea of killing his son, and that in one of these crises the internal voice said to him, "It is in vain to resist, the boy must die, you must kill him." This thought made him tremble; he prayed, he occupied himself with various labours, and succeeded in discarding the deadly idea which absorbed him. This man declared that for several weeks he had not been intoxicated, and that he was not in that state during the third attack which cost the child its life.*

It is important to remark, indeed, that hallucinations and illusions form one of the most characteristic symptoms of the action of intoxicating drinks. In the numberless cases of suicide and of homicide determined by this cause, that we have related in our *Traité du Suicide et de la Folie Suicide* there were several which had for starting-point the hallucination of hearing.

The lunatic who some years ago killed Dr. Geoffrey, chief physician of the Avignon Asylum, was epileptic and subject to hallucinations; several days before the murder he heard a voice which said to him, "Kill the doctor; if you don't, you'll be unlucky." His conduct established in the clearest manner that he had contrived his plans and acted with judgment, facts of which we have repeated proofs. When the doctor came, he complained of a pain in his foot, begged him to examine it, and while the medical man was stooping, seized him round the body, and plunged into his left side a piece of iron that he had sharpened some days before for this purpose. Although it was certain that he had meditated upon his project, and waited for a favourable moment to put it into execution, his antecedents and the examination left no doubt as to the derangement of his faculties and his continuous state of madness: he was not, therefore, brought to trial. These acts sometimes take place when they are utterly unexpected. A patient who had just been speaking with us, and who appeared very calm, saw his wife enter, whom he believed in connivance with the director of his administration and the employés; he received her with a smiling face, then suddenly raised his arm and struck her twice with the blade of a knife he had hidden: fortunately the whalebone of her stays obviated ill effects.

Some lunatics, tormented by their hallucinations, fall into such a state of despair, that they wish to put an end to their existence; others believe that these machinations are the work of persons

* Marc, *De la Folie Judiciaire*, tom. ii., p. 618. Hencke, *Annales*, viii., supplément, p. 186. Caspar, *Traité Pratique de Médecine Légale*, 1^{er} vol.

near, conceive a hatred towards them and seek revenge. One of our patients rushed upon her husband, seized him by the throat, and it was with great difficulty she was prevented from strangling him. An old lady, persuaded that her servants wished to steal her ear-rings, armed herself with scissors to resist their attacks. A lunatic who thought he was being poisoned and had seen the poison put into his food, declared he would kill some one, and finished by naming a real person.

Hallucinations are not only the cause of dangerous actions, suicide, and murder, but also of theft, incendiarism, &c. These determinations are specially due to voices which command the strangest things.

One of our lunatics seized upon anything which fell into his way. He was well bred and of a good fortune. He committed his larcenies with marvellous dexterity, and was accordingly constantly watched. Every instant it was necessary to search him, and articles were found hidden in various parts of his clothes. When reproached for this incredible mania, he replied: "I am told to take all these things because they belong to me." This disease was developed to such an extent in the case of a lunatic we saw some time ago at the Sainte Gemme asylum, near Angers, when we went there to observe some cases of pellagra, that it was necessary to put him in a strait waistcoat. Despite this precaution, he tried to steal something from us.

A person suffering from hallucinations confided to our care heard a voice, which told him to set fire to his chamber, and he acted as commanded.

Jonathan Martin, the new Erostratus, who set fire to York Cathedral, said to the judge when questioned: "Your charge of theft is ridiculous, and you do well to give it up; I never intended to abstract anything; but *an angel having ordered me* by the will of God to set fire to the church, I was obliged to furnish proofs that I alone had done this deed, so that no one else should reap the honour, or, if you like it better, bear the punishment." Jonathan Martin, declared a lunatic, was confined in Bethlehem.

A young girl of less than fifteen, named Grabowska, afflicted with nostalgia, twice set fire to the house, in order to quit her masters. She declared that from the moment she entered their serviceshe was unceasingly possessed with the desire to burn the place. It seemed to her that a spectre continually before her impelled her to this act. It was noticed that this girl for a long time suffered from violent headache, and that menstruation was behindhand.*

The illusions of sight bearing upon the changes of persons and things are so important, that although we have several times

* Marc, *Mémoire sur la Pyromanie*, tome ii., p. 356. Klein, vol. ix., *Annales Judiciaires*.

insisted upon this symptom, all our efforts ought to be employed in demonstrating their frequency and their results. It is no question here of reasoning, more or less erroneous, that is declared to be easily appreciable by every man of judgment, but of a sensorial disorder well known to specialistic doctors, which seizes half, sometimes, perhaps, three-fourths, of the insane, and the evidence of which in their eyes is such that even the voice of kindred is without strength to triumph over this illusion. Among other examples we have under our eyes, the following has left an ineffaceable impression:—A lady afflicted with melancholy, whose case we have elsewhere cited, asked every day in the most pathetic tone and the most heart-rending accents, to see her husband and her son. She would not take any food, and had to be fed with the œsophagus tube. I learnt that the same complaints had been uttered in another establishment, and that the meeting so ardently desired produced no effect. Nevertheless, touched like others in the house by a grief which appeared so truthful I sent for the husband and son: despite my experience I still hoped. After having seen them the poor lady heaved a profound sigh, and cried, “It is not those!” The trial was made a second time without more success; it was not repeated, for it might have led to sad consequences for the child. Five years after these two attempts the patient unceasingly repeated—“I implore you not to separate an unhappy woman from her child and her husband!”

(To be continued.)

ART. XII.—MEDICAL GOSSIP.

A SEVERE dignity surrounds the manner in which the Medical Council conducts its business, which must impress the profession with a very lofty sense of its wisdom. If it be the dignity of the pedagogue rather than that of the philosopher, this is, perhaps, the natural consequence of the peculiar functions delegated to the Council. It is pleasant, however, to find that it does not exempt itself from that stern adhesion to rule and precept which it is prepared to exact from others. We read, with a slight sense of awe, how in its last session it enacted that any member not present before the minutes of the previous day's meeting were confirmed, should be deemed absent; and that no member, after taking his place, should leave the meeting without permission of the chairman. Certain painful pedagoguish reminiscences immediately sprang up in our minds, and we felt assured—an assurance most fully borne out in the sequel—that the profession were once more about to be sent to school, under a rule that

would admit of no relaxation, and which was based upon no pettifogging principles, but took its character from, and was formed after, the minds of its framers. There is nothing to regret, but much to rejoice at, in this prospect; yet there is some alloy. We are required to receive the collective wisdom of the Council in its most concentrated form—in its barest results only. In the true style of the ancient pedagogue, it is *Do this* and *Do that*, or *We think this*, *We think that*, but as to the *Why* or the *Wherefore* either of the direction or the opinion, we are left, as a rule, to the exercise of our own ingenuity. Now, with all deference to the majority of the members of the Council, we think that this is wrong, and that in the end, if persisted in, such a course must prove detrimental to the influence which the Council should at all times exercise over the minds of the profession. If the Council would work well, it must carry with it the majority of the profession. But how is this to be effected unless the latter are convinced that the decisions and suggestions of the former are both fit and just? To suffer the opinions of the profession on these important points to rest solely on the ingenuity of individuals, and to assume the privilege of a mere arbitrary dogmatism, is surely a dangerous policy. It is certain that by acting thus the Medical Council detracts from the influence which it ought to exercise over the profession, and that in the end its reasonings and conclusions must suffer from the want of that free criticism on the part of those whom these reasonings and criticisms most concern, and whom it is to be presumed have a chief interest in the matter. There may be many good reasons why reporters for the press should be excluded from the general meetings of the Medical Council, but there are many better why they should be admitted—at least, such we think is the soundest experience to be derived from the working of those public bodies which may be conceived to be analogous in their functions to those of the Medical Council.

Apart, however, from our tendency to grumble on this general question, the profession has much reason to be most highly gratified by the work effected by the Council in their last session. The recommendations it has made in reference to general and professional education go to the very root of the question of medical reform. It is only by raising the standard of the whole profession that the chief abuses which affect medicine in the present day can be eradicated, and it is through the student alone that this elevation can be permanently effected. The recommendation that all students should pass an examination in general education *before* they commence their professional studies, will, when carried into effect, be an immense step in advance. It will ensure the fitness of the student for the study of medicine, as far

as this can be tested, and will for the future secure an average degree of mental training among students much higher than it has been customary to find or to require, and more befitting the acquisition of a complex profession.

The Council, while recommending this preliminary examination, do not lay down any complete scheme of general education for persons intending to become members of the profession, but they recommend that the scheme of examination in Arts of the licensing bodies should be, as nearly as practicable, similar to that of any one of the national educational bodies which they have specified (*e.g.* the Oxford, Cambridge, and Durham Middle-class examinations, &c.), testimonials of proficiency from which will exempt the holder from the preliminary examinations established by the licensing bodies. The Council, indeed, recommend that eventually the preliminary examinations should be left entirely to the examining boards of the national educational bodies which they name. No certificate of proficiency in general education will, however, be deemed sufficient, which does not affirm that the candidate has a competent knowledge of Latin; and after January, 1853, all junior Middle-class examinations will be excluded from the exemption list. The "time of commencing professional studies" is to be understood to be the "time of commencing studies at a medical school." This important decision must prove a death-blow to the vile and degrading system of apprenticeship, by refusing to acknowledge it as a part of professional education.

The remaining recommendations of the Council on the subject of education, may be briefly summed up thus:—All students to be registered within fifteen days after the commencement of the winter session; no professional licence to be granted at an earlier age than twenty-one years; four years of professional study to be required after the examination in general education; and the professional examinations to be divided into at least two distinct parts, the first not to be undergone until after two years' study, the second after the termination of the four years' study. It is suggested, moreover, that the examinations shall be conducted partly *vivâ voce*, partly in writing.

Most of the examining bodies have already anticipated to a greater or less extent the method of examination here recommended. Belonging to the time of cosy *vivâ voce* examinations, rarely exceeding an hour in duration, we compare with no small amusement the ordeal we ourselves were compelled to endure, with that which confronts the student of the present day, and which threatens the student of the future. How well we remember the pleasant quarter of an hour's chat with the honoured President of the Medical Council, at the College of Surgeons. How can we forget the kindness with which he proceeded to

unfold the mysteries of a recondite physiological point, which in some manner or another had arisen out of his first question to us at the third table. Most grateful also is our remembrance of the genial tenderness with which Mr. Lawrence dealt with our little weaknesses, and of the agreeable gossip with Mr. Arnott. Mr. Arnott's examination took the form of an easy conversation of which, curious enough, one of the subjects was Mr. Teale, another member of the Medical Council. So chatty did the talk become that Mr. Arnott seemed to lose sight of the object of our being before him; and in answer to one or two questions from us he kindly gave us some very interesting information on one or two surgical points, when, as it were, suddenly bethinking himself, he exclaimed, infinitely to Mr. Guthrie's amusement, who sat along with him, and who in fact laughed outright, "It is you who are here for examination, sir, not I!"—or words to that effect.

Among the candidates who presented themselves for examination at the College of Surgeons the same evening as ourself, was a Licentiate of the Apothecaries' Company. We had met him once or twice before in the Secretary's room, while making the preliminary arrangements for our examination. On the evening of the examination, we had no sooner entered the College than this gentleman coming up to us, said, "By the way, do you know anything of the perinæum?" "Certainly," we answered. "Well," he rejoined, "I don't; I have not thought it worth while to get it up." "Not thought it worth while to get the perinæum up!" we exclaimed, with the most unfeigned amazement; "and offering yourself for examination." "Well," he said, "the fact is, the Examiners have been examining a good deal lately on the perinæum. Now they don't often question upon one subject long, lest students should get up specially for it; so I think the chances are against their asking much about the perinæum for a few nights, and consequently I've not bothered about it. Will you, then, if we're both out of the first batch, give me a little 'grind' on the subject?" "Certainly," I said, "I'll do what I can for you, but I suppose you have dissected the perinæum?" "Oh no," he coolly answered, "I dodged that." We were examined among the first batch of candidates; our extemporized friend was examined with the second. At the first table, fortunately, he was questioned on the perinæum, and of course broke down most wretchedly—in fact, he was not suffered to pursue the round of the Examiners. And so, for the time being at least, some unlucky locality was saved from the infliction of this ghastly specimen of unprincipled ignorance. We hope that the last days of persons taking their "chance" of passing in this fashion have gone by.

The final recommendation of the Medical Council on Education, "That it is not desirable that any University of the United Kingdom should confer any degree in medicine or surgery, whether

that of Bachelor, Doctor, or Master, upon candidates who have not graduated in Arts, or passed all the examinations required for the Bachelorship in Arts, or the examinations equivalent to those required for a degree of Arts," has drawn a somewhat sharp response from the University of Edinburgh. The Senatus, while asserting that it would not yield to the Medical Council in anxious desire to improve and maintain the educational standard of medical graduates, whether in general or professional studies, suggests that different views might reasonably be taken of the best mode of attaining the object by different individuals. It expresses the opinion that "any such requirement in general studies as the Medical Council recommend, would be unequal, unfair, and even impracticable in many instances, so long as the same nominal degrees in Arts denote in different universities quite different standards of acquirement in the same branches, and even imply the study of different branches." It points out that the standard of examination for a degree in Arts of the Edinburgh University is now so high that it would be quite unreasonable to impose such an examination on candidates for a medical degree; and that were so high a qualification demanded of these candidates the result would be, not the advancement of the general education of medical graduates, but the necessity of lowering the standard for the degree in Arts. The Senatus then, "with great respect, takes the liberty" of reading the Medical Council a lesson. It wishes it to understand that, as becomes the dignity of an ancient University addressing a new-fangled Educational Board, it has noticed the recommendations of the latter simply as an act of courtesy. It conceives that the Council has gone beyond its jurisdiction in recommending to the Scottish Universities a different plan of education and examination from that which the University Commissioners have enjoined in their ordinances. The Medical Council is empowered by the Medical Act to take the necessary steps, according to a certain form of procedure, to secure, on the part of all persons presenting their qualification for medical practice to the registrars for admission into the register of legally-qualified practitioners, "the possession of the requisite knowledge and skill for the efficient practice of their profession." (Clause xx.) Now, the Senatus holds that the Medical Council have the right to demand this much of all graduates and licentiates of Universities and Medical Corporations alike and no more. "They are not empowered," says the Senatus, "to demand or recommend that, while the licentiates or corporations shall be qualified to that extent, graduates of universities shall be qualified in a higher degree; and the duty of fixing what that superiority should be, belongs to the authority of the Universities."

The Senatus is doubtless right in law and fact, but the Medical Council is certainly right in principle. The practical question

is beset with many difficulties, but we do not fear that as the general standard of education in the profession advances, that of medical graduation, where below the level of our typical universities, must also advance.

Apropos of professional education, the institution of a degree in surgery (Master in Surgery), by the University of Cambridge, is a matter of considerable interest. Two of the English Universities, Durham and Cambridge, now give the degree of M.C. The examination for the surgical degree at Cambridge will be divided into two parts. The first will be the same as the first examination for M.B. degree, and the course of study for both degrees will be similar up to this point. The requirements for the second examination for M.C. will be anatomy, practical and surgical, pathology, and the principles and practice of surgery, clinical surgery, midwifery, and medical jurisprudence. The degree of M.C., as that of M.B., may be taken five years after admission to the University.

The chief gossip of the quarter is so intertwined with the proceedings of the Medical Council, that we cannot do better than take these still as our guide.

It is amusing to notice the little hitches that transpire from time to time, in the most perverse way, to the free working of the Medical Act. The Act provides that every person registered under it "shall be entitled, according to his qualification or qualifications, to practise medicine or surgery, or medicine and surgery, as the case may be, in any part of Her Majesty's dominions." It would appear, however, that a local Act exists in Canada, which requires all medical practitioners there to have the Governor-General's licence, and this is only granted to practitioners from the mother country if they possess a degree in medicine or surgery from a University, excepting only the licentiates of the London College of Surgeons, and that of the Dublin or Edinburgh College of Physicians—the former escaping the operation of the local Act by right of their privileges dating anterior to it, the latter by favour. Now, this provincial Act is proving very obnoxious to certain enterprising licentiates of the various licensing bodies who come within its restrictive scope, or, at least, one martyr has come to the surface, and the Medical Council has been called upon to interfere, and will no doubt do so effectually.

The *British Pharmacopœia*, it is most gratifying to learn, is approaching completion. The Pharmacopœia Committee of the Medical Council, in reporting upon the exact state of forwardness of the work, give us to understand that it will be divided into two parts, with an appendix. The first part is to contain a list of the *materia medica*, in which all the substances employed as medicines will be inserted, and appended to each will be its

definition, and a statement of its origin, principal characters, the tests for purity, and an enumeration of its officinal preparations. The second part will contain the various groups of Galenicals, as extracts, infusions, tinctures, ointments, &c., with the method of preparing each, likewise the processes for making the numerous chemicals described in the first part of the work. The appendix is to include the substances employed, not as remedies, but only in their preparation, and likewise the various test solutions to be used in ascertaining the strength and purity of drugs. It is hoped that the *Pharmacopœia* will be published before the termination of the year; but the delay in its appearance, and seeming tardiness of compilation, is readily understood when it is known that every preparation in the work has been made, often repeatedly, and such process practically examined.

We may venture to hope that during the next session of Parliament some amendment will be made in the penal clause (XL.) of the Medical Act. As constituted, it is worse than useless. Several suggestions were made to the Medical Council, by which it was hoped that the difficulties that had arisen from the lax wording of the clause could be got over; but the Council will not proceed hastily in the matter. It is well that this should be so.

It will be a difficult task to weave the meshes of the legal net sufficiently close to catch the more dangerous charlatans, without at the same time narrowing them so greatly as to risk the danger of popular reaction on account of overstraitness. For it is never to be forgotten that quackery is but an instance of popular credulity, and exists only on condition of the existence of that credulity. Hence measures for the restraint of quackery must, to be effective, proceed *pari passu* with measures calculated to diminish the credulity. But the means by which this is to be brought about are rather indirect than direct, and must depend greatly on the intellectual advancement of the people generally. The public weal is intimately concerned in the suppression of quackery, but unhappily the public has but a very restricted appreciation of the truth, and they will not learn it by any arbitrary measures. Morrison and St. John Long lie beneath splendid mausoleums in Kensal-green cemetery, while one of the most distinguished orthodox physicians of the present century has but a simple mural tablet in the adjacent chapel. We must not lose sight of these facts, lest we should unwittingly convert disreputable quacks into *quasi*-reputable martyrs. The law must be made a means of disgraceful exposure as well as of suppression, if it is to be effective; for the suppression will in reality only be commensurate with the disgrace attending the exposure.

But, unfortunately, although illegal practice (whenever this may be verbally as well as morally defined) will include a vast

mass of charlatanism, charlatanism is by no means confined to illegal practice. To see the fullest fledged charlatanism we need not step beyond the bounds of the profession. The most refined quacks stalk under cover of a legal qualification. The Register may, perhaps, be held *in terrorem* over the most arrant of these, but, after all, the only check upon them must be in the tone adopted by the body of the profession. We frankly confess to a species of respect for the bold charlatan who sets medical degrees and licences at defiance, and snaps his fingers openly at orthodox physic and physicians; but for the man who avails himself of a medical diploma or licence to cloak the practice of homœopathy, or hydropathy, or any other form of charlatanism, we have the most unmitigated contempt. In this case there can be no palliation; for if the man were honest he would put his diploma or licence aside, and the absence of honesty forbids usually the assumption that he acted from ignorance. The man is, in fact, a lie from beginning to end, and as such ought to be treated.

A glaring illustration of this class of practitioners was brought to light in the Court of Probate during the past quarter. A certain Dr. David Griffith Jones, a member of the Royal College of Surgeons, and asserted M.D. of Marischal College, Aberdeen, propounded a will in which a patient had left to him property to the value of about 3000*l.* This will was disputed by the Queen's proctor, and ultimately Dr. Jones was arrested and imprisoned on the charge of having forged the signature of the testator, and he now awaits his trial for this offence.

In the course of his examination in the Probate Court, Dr. Jones gave a curious history of his professional practice. He stated that although originally educated as an allopathist (by which we presume he meant as a practitioner according to the tenets usually held to be sound by our examining bodies), he had practised both homœopathy and hydropathy for a period of nine or ten years. Not, however, content with combining two systems of charlatanism, he had recourse to a third. He confessed to being the proprietor and patentee of a medicine called "*astramancax*," which he sold as a substitute for cod-liver oil. It was, moreover, elicited from him in the progress of cross-examination that his M.D. degree from Marischal College, Aberdeen, had not been honestly acquired—that a friend of his, in short, had personated him at the College examination. This confession, as may be imagined, put a stop to the case, the witness's evidence being manifestly quite unworthy of credit.

This unvarnished story needs no comment, other than it shows the importance of the profession excising socially and, as far as possible, legally, all charlatans who prostitute the legitimate diplomas and licences of medicine.

The proposed amalgamation of several of the medical societies

referred to in our "Gossip" of last quarter, has unfortunately fallen through, and the Medico-Chirurgical Society, its scheme having failed, has determined to effect an internal reform, by appointing Committees of Investigation from time to time.

Several questions of medical interest were brought before Parliament in the course of last session.

Lord Monteagle presented a petition from certain native Indian subjects of the Crown, complaining of their exclusion from the competitive examination for appointments to office; and he maintained the injustice and illegality of the exclusion. The question more especially arose out of, and referred to, the medical service of the Crown. Lord Herbert (whose loss the country has had so recently to regret), in reply, justified the exclusion both in law and reason. He stated that the Government had thrown open the right of competing for all appointments of a certain class in India to native-born subjects; but the claim of the petitioners was to be appointed surgeons and assistant-surgeons in line regiments liable to be stationed in all parts of the world. Now, the Directors-General of the Army and Navy Medical Departments, and Sir Ranald Martin, had, when called upon to give their opinion as to the fitness of Parsees for service in all quarters of the world, stated:—"It is our deliberate opinion, founded on experience, that the native and mixed race of India and other tropical countries will never be able to sustain, for any length of time, the climate of our Northern regions; and that they can only be employed advantageously to the public service in climates similar to those in which they exist." Lord Herbert thought this opinion conclusive, there being no legal claim of the petitioners to admission into the general service of the Queen.

A discussion was provoked in the House of Commons by a Bill introduced by Mr. Lowe to the effect that Poor-Law Boards might appoint persons to prosecute under the Vaccination Bill those whom the medical officers reported ought to be prosecuted, and to allow the expenses of prosecution to be paid out of the poor-rates, unless the magistrates should be of opinion that the information was improperly brought. The clauses proposed were somewhat modified in Committee, and the Bill passed.

The Lunacy Regulation Bill, introduced by Mr. Walpole, was arrested in its course, and the further discussion of the subject postponed.

The internal condition of the Irish District Lunatic Asylums was brought before the House of Commons by Mr. Blake. He drew an unfavourable comparison between the Irish and English public asylums, but he omitted to notice certain differences in the habits and social condition of many of the patients,

which made the differences rather apparent than real, and that with a little ingenuity the comparison might be drawn in favour of the Irish asylums—a point not overlooked by the new Chief Secretary for Ireland, Sir R. Peel, in his reply. In the course of the discussion, which led to no results, Mr. Osborne paid a well-merited compliment to the “manly and able manner” in which Drs. Nugent and Hatchet had performed their duties as inspectors of lunatics.

The feud between the visiting physicians and managers of the Irish District Asylums has broken into open war. Both parties have appealed to the Lord-Lieutenant, but a fierce partisan warfare is being carried on in the meanwhile.

The Labourers’ Cottages Bill, to which we have had occasion to refer in a previous number, was thrown out in the House of Lords.

Whatever difference of opinion there may be upon the question of special hospitals for the treatment of diseases, we presume that there will be none upon the propriety of founding a hospital for Incurables. These unfortunates have a great claim upon the consideration of all charitable people, and it is pleasant to record that the preliminary steps have been taken for founding an institution for at least a small number of them in the vicinity of London.

We may not do more than allude in the briefest way to the meeting of the National Association for the Promotion of Social Science at Dublin, under the presidency of Lord Brougham, and the meeting of the British Association, under the presidency of Mr. Fairbairn, at Manchester. Both meetings were great successes and at both medicine was most ably represented.

The British Medical Association also met at Canterbury, under the presidency of Dr. Lochée, of that town. The meeting was well attended, and appears to have off passed very pleasantly. The chief topics of discussion were consultation with homœopaths, and special hospitals. The Association passed a series of resolutions condemnatory of the former, and calculated to purge the Association of any heretical members, and gave up the latter in despair.

A sadder subject furnishes the last note of our gossip. It is hardly too much to say that but one pleasant feature has become apparent in the fratricidal war which now convulses the United States. The energy with which our American medical brethren attached to the forces in the field have met the enormous sanitary evils arising out of the rapid formation and necessarily incomplete camp equipment of volunteer corps, and the admirable manner in which they have kept at their posts, even in the horrid turmoil of defeat, is beyond all praise. After the disastrous action at Manassas, several of the Federal surgeons remained on the field, attending to the wounded, after the retreat of their regiments, and of course fell into the hands of the Confederate troops.

The medical men have been nobly aided in the hospitals by the American ladies, and a Miss Dorothea Dix, who has been termed by one of her contemporaries "a monomaniac in philanthropy"—one of those unfortunate feminine sneers which become a golden testimony to single-minded nobility of aim—is desirous of emulating the deeds of Miss Nightingale.

ART. XIII.—LITERARY GOSSIP AND RECORD.

IF we glance back at the past twelve months and seek to estimate the merit of the period by its literary productiveness, the result is not very exhilarating. If we look forward and endeavour to ascertain the promise of the forthcoming year, the prospect is by no means encouraging.

Not that the past twelve months have been altogether wanting in notable works, or that the future twelve are entirely devoid of promise; or that the numerical value of the works published in the former period or promised in the latter is more than ordinarily insignificant; but a preponderance of minor works marks the one, and would appear to be threatened by the other.

Yet it is to be remarked, that the literary deadness of the past year was not peculiar to this country. In France, little literary vitality seems also to have been manifested during the same time. If, however, the literary retrospect is not very exhilarating, it is by no means wanting in interest. There was a demand for new editions of recent and comparatively recent works, which must have been most gratifying to the authors, and which told well for the worth and stability of many of the additions to English medical literature within the last three or four years. Many new editions of recent works also characterize the promise for the coming year.

Of the new works published since the 1st of October, 1860, the chief place in literary importance must be assigned to Dr. Maynes' *Expository Lexicon of the Terms, Ancient and Modern, in Medical and General Science*; in physiological, to Dr. Edward Smith's *Treatise on Health and Disease, as influenced by the Daily, Seasonal, and other Cyclical Changes in the Human System*; in pathological, to Dr. Chance's translation of Virchow's *Cellular Pathology*. John Hunter's *Essays and Observations on Natural History, Anatomy, Physiology, Psychology, and Geology*, edited by Mr. Owen, have a special interest apart. The publication of the *Roll of the College of Physicians* is a happy and valuable addition to a portion of our medical literature too much neglected; and Dr. Meryon's *History of Medicine*, when completed, will supply a want much felt.

Mr. Holmes's *System of Surgery* will successfully fill up a great hiatus in our encyclopædical literature; and Mr. Barwell's excellent treatise on *Diseases of the Joints* will take its place among standard works on surgery.

In medicine we have the works of Dr. Parker and Dr. Beale on the *Urine*; Dr. Lyons on *Fever*; Drs. Jenner and Greenhow on *Diphtheria*—the latter a valuable and complete treatise, the former a brief practical dissertation on the subject; Dr. Copland on *Consumption and Bronchitis*; Dr. Goodfellow on *Bright's Disease*; and Dr. Routh on *Infant Feeding*.

Finally, we would note two interesting additions to medical biography—the *Autobiography of Sir James Macgregor*, and the *Life of Marshall Hall*, by his widow.

This is certainly a most scanty list, but if the quantity is defective, the quality is by no means to be complained of.

Of the works promised in the present quarter, we shall direct attention to one only—a work on *Hygiene*, designed especially for the use of officers of health, by Drs. Lankester and Letheby. This will be a most welcome addition to medical literature: would that the same gentlemen were about to give us a complete treatise on the subject! It is a curious and most inexplicable fact, that notwithstanding the unusual amount of attention which has been given practically to Hygiene, both public and private, in this kingdom during the last twenty years, not a single complete treatise, not even a manual of the subject, exists in the English language.

OUR LIBRARY TABLE.

The Roll of the Royal College of Physicians of London; Compiled from the Annals of the College and from other Authentic Sources. By WILLIAM MUNK, M.D., Fellow of the College, &c. Vol. I. 1518—1700. 8vo. Longman.

This is a very valuable addition to what may be termed Class-biographies, and supplies a want in the history of science in England. The industrious author, Dr. Munk, being sensible of that *desideratum*, had deposited his carefully collected materials in the library of the College of Physicians for the use of his brother Fellows, without any view to their being published. But the Council, justly appreciating their merits, and aware of the benefit which others than the members of the corporation would be likely to derive from such a work of reference, ordered the Roll to be printed. Accordingly, while thus paying a proper tribute of respect to Dr. Munk, they have entitled themselves to the thanks as well of the profession as of those who take an interest in the lives of the learned. For the names of more than two-thirds of the individuals commemorated in the volume, we should search in vain the columns of our most extensive biographical dictionaries.

While endeavouring to record as much as is essential to the history of those early physicians, Dr. Munk has with proper judgment abstained from all irrelevant matter or parade of authorities, with which a less judicious compiler would have overlaid his work. He has had to travel in many obscure by-paths of the past, and where research has proved unsuccessful, the failure has evidently proceeded from no want of pains. As the Roll will take its place hereafter with the *Athenæ* of Wood and of the Messrs. Cooper, and similar standard authorities, we note a few points that have occurred to us in perusing it, which may be serviceable in the event of a second edition.

The Dr. John Craige, whose memoir occurs at p. 112, was the third son of the eminent lawyer Sir Thomas Craige, of Riccarton, whose treatise *De Feudis* is one of the noblest monuments of the legal literature of Scotland. That he was a friend of the philosopher of Murchison there is no doubt, but that Napier was indebted to him for the idea which led to the discovery of logarithms has been disproved by Mr. Mark Napier, in his elaborate life of that illustrious inventor, where particulars of Craige's intimacy with Tycho Brahe may be seen.

In regard to Sir Francis Prujear, the celebrated President of the College of Physicians, we should have liked Dr. Munk's authority for assigning Essex as his native county. That he possessed considerable estates there is well known, but we have some doubts as to his having been born within its confines. His first wife was of the old family of Legat, of Dagenham. A portrait of him is in the possession of the last representative of his family, Mr. Francis Prujear, barrister-at-law, to whom also at one time belonged a portrait of his son, Dr. Thomas Prujear, which has been unfortunately lost.

It seems to have escaped Dr. Munk, while sketching his memoir of Sir Theodore Mayerne, that some twenty volumes in autograph of that distinguished physician exist among the Sloane MSS. in the British Museum. One of these contains memoranda of his professional attendance on King James I.; the others, entitled *Ephemerides*, form a journal of all the cases which he attended from 1603 to 1649. These are especially curious, from the very minute statements which they give, not only of the symptoms of the disease, and the remedies prescribed, but of the personal formation, state of the organs, peculiarities of diet, affections and antipathies of the patient, as also of the complaints to which his patients had been liable. As Mayerne was the court physician of his age, the vast majority of the cases were those of the aristocracy of France and of Britain. They are all written in Latin, and, if printed with suitable annotations, would form the most interesting medical annals ever published. Can the Council of the College be induced to bestow another favour on the public by producing these relics of so noted a member of their body, under the editorial care of Dr. Munk, whose capabilities for such a task are so well exhibited in this Roll? A reprint of the Case-book of Dr. Thomas Hall, the son-in-law of Shakspeare, would also be acceptable.

A Treatise on the Surgical Diseases of the Eye. By HAYNES

WALTON, Surgeon to the Central London Ophthalmic Hospital, and to St. Mary's Hospital. Second Edition. Re-written. 173 Illustrations. 8vo.

Among the notable surgical books of the year, is a second edition of this work, and it is certainly what the preface expresses, "a new edition in the fullest sense of the word." With several new chapters, and many re-written, some re-cast, and all improved, this is, indeed, a new book which contains all that is good and trustworthy in ophthalmic surgery up to the present hour, issuing from a highly accomplished and successful surgeon in large practice, written with remarkable clearness, well printed, and most beautifully illustrated.

While for a long period the great advantages of chloroform in general surgery have been recognised, it is only now that we have its application to operations on the eye well defined. In a chapter which is sufficiently full in all that relates to this subject, including important rules for administering the drug, we learn when the chloroform is advantageous, when it may or may not be given according to the patient's desire, and when it is profitable to withhold it.

Injuries and accidents to the eye are practically and scientifically discussed. Besides the individual personal importance attaching to these, there has of late arisen the legal question of compensation, and in Mr. Haynes Walton's volume will be found the solution of many problems heretofore not understood. How it is that vision may be lost from a blow on the eye so slight as to make no external mark, or a stroke on the forehead, or head, is here shown. The causes are demonstrable, the physical changes are palpable by the aid of the wonderful ophthalmoscope.

Following the preceding subject is that of sympathetic implication of the eye. Our author shows that the general opinion respecting this is erroneous, and that any injurious sympathetic action almost exclusively arises out of wounds, or injuries that disorganize an eye.

The many delicate operations on the eyeball are described in a masterly manner, and the surgical treatment of squint, strange to tell, only till lately perfected, is well explained, and, according to what we are here told, reduced to certainty, if there be a proper selection of cases; no difficult matter, it would seem.

A special chapter is devoted to iridectomy and other operations for the cure of glaucoma. The following remarks on the former operation will be read with interest:—

"That the operation has been recklessly performed by being applied to cases to which it is wholly inapplicable, according even to its propounder's theory, I have had frequent proof. It is useless to give particulars. Graefe, as I must remind my reader, lays great stress on the curative results, according to the stages of the disease.

"I am sorry to say I have seen several instances in which iridectomy has been applied where there was no glaucoma, and to the injury of the patient. In most of these it has been done, as the modern phrase goes, 'in anticipation of the disease.' I have saved many patients from being subjected to it, in whom there was very slight defective sight from haziness of the vitreous humour, or whose eyes were affected merely with sclerotic inflammation. I

have had the satisfaction in ascertaining, by actual inspection, that some of these—all that I have been able to watch—have completely recovered.

"But all these things tell nothing against iridectomy, if it be a valuable operation. Certainly not; they only show the abuse of the measure. The same indiscretions may, and do, attend our most valuable operations. A man may operate for stone where there is none in the bladder; or proceed to relieve a strangulated hernia, where there is no rupture. But in the present instance, with the existence of great difference of opinion about the utility of the procedure, and when men are seeking for evidence from facts, the exposure of such error and malpractice is of value, because it shows that there may be conclusions from very insufficient, as well as wrong data.

"It remains for me to give the result of my experience from what I have seen of the operation in glaucomatous eyes, in the practice of others, and from my own. Respecting the first, the cases have been, with but few exceptions, of the chronic form of the disease. In some of them there was certainly a slight improvement of vision for a few days, but in none has this been more than temporary. Pain has also been relieved, and, in a few, has been so long absent, that it has been supposed to be for ever removed, when, with sad disappointment, it has returned. Some of these had been published as most successful cases. Of the acute kind I can give no better report.

"My own operations have not been numerous. Having been disappointed in the result in some well-selected cases of acute glaucoma (and these have been few, for with no small field of observation I do not find such cases common), I could not make that strong recommendation to patients which they required respecting the success of an operation, or the possibility of success, to induce all to submit to it.

"While I wish it most fully to be understood that I do not condemn iridectomy, I must express my own conviction that I attribute all the good effect which may follow to the mere tapping of the aqueous humour. I have found as much benefit to sight and reduction of pain from this, as I have been able to trace to the other measure. In a private patient of mine, seen by several other medical men, there was sub-acute glaucoma in one eye of nine months' standing. This lady had coruscations, and much pain. She could read nothing. The iris bulged, and the pupil was slightly dilated. Two days after the first tapping she could manage to read a part of one of the articles in the *Times*. The pain was relieved, and the coruscations lessened. Vision then got as bad as before, and a slight attack of acute inflammation supervened. Several tappings, at intervals of a week, enabled her to read large type, but not with clear vision. The pain quite left her, and the coruscations almost disappeared. This improved state lasted five months, as long as I attended her; during which time there was no accession of inflammation. The vitreous humour was always too hazy to afford a satisfactory examination of the fundus of the eye.

"I do not by any means infer, or wish it to be understood, that I believe tapping the aqueous humour to be a remedy for glaucoma. That it is capable, occasionally, of affording relief, I am sure; but as I have not yet practised it, either as extensively as I wish, nor with that degree of accurate observation which is necessary to establish facts, I would rather say no more about it.

"There is quite authority enough, even from some of our English surgeons, to warrant any inquiring student to undertake iridectomy. If a man, whose opinion in surgical matters is considered to be of a superior kind, more especially in ophthalmic subjects, speaks of it as a sure and certain remedy in glaucoma, and as arresting the disease and restoring sight in a marvellous manner, surely it ought not to be left untried. I will merely suggest that, if the trial be made, fitting cases should be selected; and that full and well-authenticated reports, extending over a sufficient period, be given by the

operator to the public; and withal, that the facts be attested by others. The anonymous reports in the medical journals, on most operations, are, as a rule, of less value, when accuracy is needed, than is supposed; and in the present case, those that have been published are not exempt from this charge."

Mr. Walton's work concludes with a chapter on the ophthalmoscope, the great discovery of the age in this department of medicine, and which owes its origin to an English medical student, although undoubtedly the Germans perfected the discovery and made it available for practice. With this instrument, or speculum, with which we can explore the interior of the eye, diseased states, of which formerly no knowledge existed, are clearly seen and understood as if they occurred on the surface of the body. The earliest stage of cataract, heretofore inscrutable, can be most readily and quickly discerned. Indeed, the student of the present day, with the ophthalmoscope, is able to understand more about the diseases of the eye than the veteran professor of a past generation. Mr. Walton's treatise contains all about the subject in a practical form.

De l'Etude de la Folie. Par Dr. J. M. GUARDIA. Paris: 1861. pp. 32.

Dr. Guardia announces that the higher studies languish and die in France, that though the educational machine appears to move pleasantly and prosperously, its products are inadequate to justify veneration for the system pursued, and that nothing foreshadows a return of energy and usefulness. From this sweeping censure Claude Bernard and Berthelot are excepted, as fulfilling the high functions of sages and teachers. At the root of this decadence are placed the exclusion of physiology from the domain of metaphysics and theology, the puerile attachment to the arbitrary dualism, or distinctions between spirit and matter, and the panic inspired by materialism. A review of the works devoted to the exposition of mental disease which have appeared during the last sixty years will demonstrate how and where the true and fruitful investigation of the subject has been receded from or approached, and may trace these results to the individual characteristics of the inquirers. In the opinion of Stahl, the soul was the principle and directing influence of life, the guide and governor of the organization; it suffered from the disorders and rebellion of the viscera as a just punishment of original sin—it was conquered and humbled in the struggle maintained in order to master its slave—from the body came its imperfections and sorrows. His spiritualism or platonism tempted him to evade the difficult problem as to the seat of the mental diseases, and he preferred the elucidation of such nervous affections as hysteria, hypochondriasis, &c., the origin of which he referred to the abdominal organs. He was the last of the ancients. After the liver, heart, stomach, diaphragm, had each in turn occupied and engrossed attention, and after the brain was reduced to its old hyppocratic and servile position of being a gland to expurgate the humours, the works of the bold innovator, Borden—himself an admirer of antiquity, but the precursor of the modern school of medicine—gave to the nervous system that preponderance in the animal economy.

which has since been universally admitted. This law was proclaimed coincidently with the period when reason assumed its real rank and sway among the human faculties. In this grand, it may be designated the encyclopædic, era of progress in France, appeared the observations of Fouquet—a disciple of Borden—on insensibility, Bichat, Cabanis, and Vicq-d'Azyr followed, leaving valuable researches upon the brain and nervous centres. As a discoverer of great and original mind, as an intrepid philosopher, and as an accurate and consistent physiologist, the striking merits and services of Gall must be acknowledged by every man. Although unrewarded and uncanonized, he has this distinction, of having promulgated a thorough reform in our conceptions of the higher mental powers.

Like the knowledge of the nervous system, the study of mental disease is modern. The priests burnt the insane as possessed, the philosophers arrived at no more correct views of the derangement of intellect than the maniacs themselves. Friederich shows how numerous and how illusory were the attempts to grapple with this class of affections until an intimate knowledge of the phenomena of the nervous system was attained. To Pinel alone belongs the glory of first carrying into the study and treatment of insanity clear views and humane sentiments. He belonged, however, to the eighteenth century—he was timid, undecided, and the slave of scholastic influences. At once a man of progress and a man of routine, an innovator and original, but vague and unsteady, he gave the signal for battle even before Bichat; he recalcitrated, then re-entered the strife, and ultimately fell into and disappeared along the backward groove. Esquirol, his worthy successor, an observer, in the strict sense of the word, possessed those second-rate qualities which constitute a physician. His sagacity did not penetrate beyond the fact—he saw, noted, and described faithfully phenomena, without seizing the relations which give them significance, not perceiving, perhaps, the necessity of working out the subject synthetically. He had the tendency of narrow but practical intellects of doubting that generalization is compatible with practice.

His works are a collection of memoirs, a repertory abounding in facts, but they do not develope a law or a theory. Unlike his predecessor, he was absolute, exclusive, confined himself to his speciality, and repudiated alike the authority of his master, and the innovations which pressed upon him from all sides and sources. The capital and fatal errors of these great minds were, that they were reactionary in the revolution in science which swept around and past them; and that they were hostile to the views of their contemporaries, Gall and Broussais. These regenerators have lived in anticipation of a more developed state of intelligence, capable of appreciating and applying the solemn and essential truths which they advocated. Their creed may be summed up in the aphorism, there can be no function without an organ, no psychical phenomenon without a nerve. Georget, Lallemand, Leuret, are enumerated as eminent disciples of this school; but although Dr. Guardia affirms that the design of his essay has been to show that the principle of life has been misunderstood, that it is

necessary to go back to a cerebral physiology which shall not, like the psychology of the present day, be confined to the intellectual faculties, but which shall include the instincts and propensities and sentiments demonstrated to be connected with the base and posterior parts of the brain; one object is constantly before him, he offers homage to another and a most distinguished member of this group. The pamphlet is as much an eloge of M. Falret, senior, as a monody upon the state of medical education. Besides incidental tributes, there is to be found at pp. 11, 17, 26, a laboured panegyric upon this physician, who may be justly described as not merely the representative of a particular dogma or doctrine, but as at the head of the Psychological School in France. So entirely do we coincide in the description given, that we shall quote one of many similar passages:—

“He has found in the study of mental diseases a compensation for the sacrifices entailed by the choice of a liberal career, and of obeying a particular mission. In his difficult speciality, he stands alone and eminent. This lofty position has been secured by his rare sagacity, a profound knowledge of the human understanding, a wide experience; a rational and successful mode of treatment; a suggestive and effective style of teaching; profound writings, characterized by sound sense, original and vigorous expositions, minute and refined criticism, and progressive tendencies indicative of the originality and comprehensiveness of his mind.”

Accepting his observations in the light of a somewhat special pleading in favour of a certain school and opinions, it does not seem necessary, after the analysis introduced, to take exception to the bold, it is suspected rash, style of the advocacy; nor to the onesided representation which he has given of the opinions themselves, and of the relations which they hold to the physiological views, or the actual practice of those by whom they are entertained. We are unworthy co-believers; but our convictions have ever been, that to treat mental disease solely in reference to the known connexion between mind and nervous matter, would be absurd and fruitless; equivalent to confining the attention in chorea to the muscular system; and that the true pathology was to regard insanity as a symptom of various diseases, situate in solids or fluids as the case may be, expressed and exhibited through the nervous system; and that the legitimate and successful treatment must be directed to the removal or mitigation of those structural changes, it may be in the digestive organs or in a nerve cell, upon which delirium, or depression, or perverted affection depend. That erroneous views or imperfect knowledge, as to this subject, prevail, or are likely to prevail, among the members of the medical profession is rendered probable, if Dr. Guardia's statement “that instruction in psychology is reduced to a few lectures, delivered once a week, for three months, by Baillarger, the zealous physician of Salpêtrière,” be received without qualification. The abrupt declaration, “clinical teaching does not exist,” sets at nought the hundreds of youths now engaged as medical assistants in public, departmental, and private asylums throughout France, who enjoy the most extensive means of observation and instruction, and in what is correctly styled the clinical form. The results of this system, the exclusive and contracted character

of which is to be lamented, may be seen in the assembly of great and gifted men who now constitute the Société Medico-Psychologique.

Lectures on the Diseases of the Kidney, generally known as "Bright's Disease," and Dropsy. By S. J. GOODFELLOW, M.D. Lond. F.R.C.P., Physician to the Middlesex Hospital, &c. London. 1861. 8vo, pp. 306.

This is one of those thoroughly useful books which are at all times a boon to the actively engaged practitioner. It is the work of an accomplished and thoughtful physician; and together with the results of his own practice and observation, presents an excellent and valuable summary of all that is known upon the subjects of which he writes. The lectures were originally published at intervals in the *Medical Times and Gazette*; but the author has acted wisely in gathering them together in one volume. The mode in which Dr. Goodfellow treats his subjects will be best shown by an example. The following, taken almost at random, refers to the pathological action of alcohol:—

"That alcohol is a local irritant is unquestionable, and that it produces its effects upon the system partly in this way is very probable. It may act remotely by sympathy to some small extent, as Orfila believed. But we have seen from the very able researches of MM. Lallemand, Perrin, and Duroy, from whose book I have already quoted so largely, that it is rapidly absorbed by the venous radicles, and that its principal action is directly upon the different organs which it irritates, and eventually inflames. Especially has it been proved to be present in greater proportion in the nervous tissue than elsewhere, which it more particularly excites. It disturbs its functions; it perverts and ultimately destroys the intellectual, and even the emotional faculties; it disturbs the function of the sensory nerves, both common and special, as shown by subjective tactile phenomena, strange perversions of taste, double vision, and other disorders of the optic nerves, tinnitus aurium, and other disorders of the auditory nerves. It equally disorders and destroys the functions of the motor nerves, as shown in irregularity and absence of simultaneous action of the movements. From these effects upon the cerebro-spinal system, it is more than probable that it disturbs and impairs the functions of the organic nervous system, as evidenced by defective nutrition and secretion. When taken in the form of brandy, whisky, gin, and such fluids, it impairs nutrition, probably from its great attraction for water, inspissating the blood and juices of the body. I need not mention in what large proportion water enters into the composition of the tissues and fluids of the body. It is probably in this way that it acts as a diuretic, so far as the increase of the watery part of the urine is concerned, not only from the increased quantity of water ingested with and after the brandy, but from its abstracting it from the tissues. There is no doubt that it tends to harden the brain substance, and to produce atrophy of many of the structures, not only by increasing the quantity of connective and other white fibrous tissues, and so leading to undue pressure upon the more important parts, but by condensing the fissures directly by the abstraction of water. There is no doubt of its exerting this destroying influence upon the liver. I shall endeavour to show you that it does so upon the kidney also. As a general rule, it irritates and inflames the tissues of the stomach and duodenum, and even the pancreatic and hepatic ducts, and it probably affects and deteriorates the secretion of these glands. It produces hypertrophy of the connective tissue forming Glisson's capsule, which, in its turn, presses upon the small vessels, and upon the hepatic cells, and produces atrophy of these anatomical elements in two ways, first, by cutting off the supply of nutrient mate-

rials; and, secondly, by absorption from pressure. It probably exerts a direct effect upon these cells, leading to their destruction, independently of those produced by the thickening of Glisson's capsule. The digestive processes are probably still more impaired by the bad quality of the bile and pancreatic secretion.

"Now, very much the same changes take place in the kidney as in the liver and other organs. We have seen that alcohol passes through the vessels and tissues of this organ as alcohol; it irritates these tissues, as it does similar tissues in other parts; it leads to blood delay; it impairs the influence and function of the nervous system; it produces hypertrophy of the connective tissues, forming the stroma or framework of the organ and of the capsule; and it produces a granular appearance precisely as it does in the liver. In fact, this alteration is very commonly seen in both these organs in old drunkards, especially and almost exclusively those who take the raw spirit in large quantities, or spirit mixed with only small quantities of water. Those who drink largely of beer, and perhaps of wine, are found to have a somewhat different form of kidney from those who drink it in other forms, especially when taken as gin, brandy, &c. But we have seen that alcohol separates and modifies the fatty matters of the blood. MM. Lallemand, Perrin, and Duroy, have seen this. Most pathologists believed that so far as the relation between cause and effect could be traced, it was almost certain that alcoholic beverages, when largely and continuously consumed for any length of time, led to fatty degradation. This separation and alteration of the fatty principles of the blood, have now been actually seen and proved, and probably play a very important part in the pathological effect of alcohol, when taken in large quantities, in the form of brandy, gin, whisky, &c. Saponifiable fatty matters that are visible to the naked eye are calculated to impede the circulation through the capillaries—if not to cut off the blood-supply altogether—and so produce atrophy of the secreting tissues, while the connective tissues, supporting the vessels, would receive an undue supply of blood plasma, and therefore become hypertrophied. It is not improbable that some of these fatty matters become transuded with the exudates, and thus lead to the presence of fat in the tubular, and also in the inter-tubular, substance; some may also remain in the walls of the capillary vessels, and replace in time the normal elements."—(pp. 187—91.)

Meteorology. By Sir JOHN F. W. HERSCHEL, Bart., K.H., M.A., D.C.L., F.R.S. L. & E., &c. Sm. 8vo, pp. 288.—*Physical Geography.* By the same Author. 8vo, pp. 441. Edinburgh: A. and C. Black. 1861.

These two works are reprints of the articles on these subjects in the last edition of that great literary and publishing achievement, the *Encyclopædia Britannica*. The present publications have been revised and certain additions made to them by the distinguished author; and in their present form they furnish what has long been wanted, handy, inexpensive, yet withal beautifully printed, and thoroughly trustworthy manuals of the subjects on which they treat. It is on this account that we are particularly desirous to direct the attention of students and lecturers to these two works—the one the necessary complement of the other.

To the scientific medical man a competent knowledge of meteorology and physical geography is simply essential. Without it not only several of the chief problems in biology and the causation of disease are inextricable mysteries, but even the ordinary phenomena connected

with the origin and development of maladies can be but imperfectly comprehended. Meteorological and physical-geographical facts intrude themselves largely, both into the medical and physiological, and the former have a distinct place in the chemical, courses of our Schools of Medicine. The weather, the seasons, and climate, the peculiar subjects of meteorology, have special and all-important medical aspects, and neither the weather, nor seasons, nor climate, can be rightly understood apart from physical geography.

Judging from our own experience, both students and teachers often feel the want of a text-book on both subjects, which while sufficiently brief not to exact too much from the time of the former, could be recommended without hesitation by the latter. This want is admirably supplied by the publication of Sir John F. W. Herschel's essays in a separate form.

The Platonic Dialogues for English Readers. By WILLIAM WHEWELL, D.D. Vols. II. and III. Cambridge: Macmillan. 1860-61.

Dr. Whewell has achieved the great task of bringing Plato within the reach of every English reader. When the first volume of the *Platonic Dialogues* appeared, we directed the attention of our readers at some length* to the advantages arising from the publication, and the gratitude due to the Master of Trinity, from all readers to whom the original was a shut book, for the happy idea and admirable execution of the work. We have now to record the publication of two additional volumes. The second volume contains what Dr. W. terms "the Anti-sophist Dialogues," "inasmuch," he writes, "as they are mainly occupied with discussions in which persons who have been called 'sophists' by Plato and by his commentators, are represented as refuted, perplexed, or silenced. Of such persons there will be found in the following pages, Protagoras, Prodicus, Hippias, Gorgias, Polus, Callicles, Ion, Euthydemus, Dionysiodorus, and Thrasymachus, who is, however, much more prominent in the First Book of the Republic. But though these persons are all included by some of Plato's admirers under the term *sophists*, are all involved by many commentators in that charge of false reasoning and sinister purpose which *we* imply by the term, and are looked upon by many persons as a sect or party who made common cause, corrupted the moral principles of the Athenians, and were unmasked and put down by Plato; they were, in truth, most diverse in their tenets, characters, position, mode of discussion, and objects; and were, several of these, as strenuous inculcators of virtue and as subtle reasoners as Plato himself." The dialogues contained in this volume are, Protagoras, the Greater Hippias, the Lesser Hippias, Ion, Euthydemus, Gorgias, Phædrus, Menexenus, and Philebus.

The third volume contains the Republic and the Timæus. In the preface of this volume Dr. Whewell writes:—

"I cannot but believe that the English reader, though he may sometimes be

* *Journal of Psychological Medicine*, vol. xiii. p. 144.

disappointed with the results of Plato's speculations, will find, in that portion of the Platonic Dialogues which I have now completed, a very striking body of writings. It appears to me also, that these writings become more striking by being taken in the order in which I have presented them. The points discussed in the *Laches*, the *Charmides*, the *Lysis*, the *Rivals*, the *Alcibiades*, though involving weighty questions, are in a great degree juvenile puzzles, belonging to an early stage of Moral Philosophy. After these, the fine dramatic delineations of other moral teachers and disputants, Protagoras, Prodicus, Hippias, Gorgias, Polus, Ion, Thrasymachus, form an extraordinary gallery of philosophical portraits. And this depiction is further graced by a lofty tone of virtuous resolve, as in the *Gorgias*, and by a thorough enjoyment of literary beauty and literary playfulness, as in the *Phædrus*; while through all there runs a steadfast assertion of the great doctrine of the Immortality of the soul, presented as the belief of Socrates in the great tragedy of his death, the *Phædo*, and again urged in various mythological forms in the *Gorgias*, the *Phædrus*, and the *Republic*; add to this subtle speculations concerning the soul and its faculties, anticipating the most acute analyses of modern psychologists:—and we have, I think, matter in which the English reader may find ground for an admiration of Plato, and a pleasure in reading him, not altogether disproportionate to the reputation which belongs to his name.

“That Plato's arguments are sometimes inconclusive, sometimes unfair, and his dramatic representations of opponents sometimes caricatures, are criticisms to which he has been subjected from his own day to ours; and the justice of them will not be denied, I think, by any one who undertakes to make sense of what he has written. I am aware that there have been persons who have explained all seeming inconsistencies and weaknesses in him by ascribing to him a habit of writing ironically. To suppose that Plato is an author whose habit is to lay traps for unwary readers by saying the opposite to what he means, would be to make him the dullest of jesters; and I should hope there are few of his Greek readers who have so poor an opinion of him.

“The *ethical* system of Plato is completed in the Dialogues which I have now published. There are other Dialogues of great interest, as the *Banquet*, the *Cratylus*, the *Theætetus*, which I have not yet translated. Whether I shall venture to undertake these, circumstances must determine.”

We trust that these circumstances may prove favourable.

Medical Jurisprudence. By ALFRED JEROME TAYLOR, M.D., F.R.S., F.R.C.S., &c. Seventh edition. London: 1861. 8vo, pp. 947.

If the publication of a seventh edition of this important standard work does not convey to the reader a sufficiently clear idea of the degree of estimation in which it is held, let him learn from the preface, that since its first publication in 1844, fifteen thousand seven hundred and fifty copies have issued from the press. In the present edition the author states that he has not found it necessary to make any extensive changes, but some articles have been abridged in order to make room for more recent information, and every chapter has been carefully revised throughout so as to place the work on a level with the progress of medical and legal knowledge.

Health and Disease as influenced by the Daily, Seasonal, and other Cyclical Changes in the Human System. By EDWARD SMITH, M.D., LL.B., F.R.S., Assistant Physician to the Hospital of Consumption

and Diseases of the Chest, Brompton, &c. London: 1861. 8vo. pp. 399.

This is a work of singular interest and importance. The writer justly says that "no work of modern date exists in which the cyclical changes proceeding in the human system are described, or in which even the influence of season is cited at any length to the causation and treatment of disease." He seeks to supply the want here indicated and to place our knowledge in this respect upon a more exact and scientific basis. To effect this he has submitted himself and others to a series of experimental observations, extending almost without intermission over a period of six years. The results of these observations have been presented from time to time before various learned societies, but in the present work the whole of the author's researches are for the first time embodied, and their application to health and disease set forth, in a connected form. From the late period at which we have received Dr. Smith's work, we are, in justice both to the author and his subject, reluctantly compelled to postpone its consideration until our next number.

Brief Notes of a Visit to the Leper Hospital, at Granada. By JOHN WEBSTER, M.D., F.R.S., &c.—pp. 13.

In this highly interesting pamphlet, reprinted from volume XLIII. of the *Medico-Chirurgical Transactions*, recently published, Dr. Webster succinctly describes various observations made by him when inspecting, during a previous autumn, the ancient institution he has named, it being one of the oldest charities throughout Europe, and originally founded by Isabella, Queen of Spain, more than three centuries and a half ago; that is, soon after Granada was wrested from Moorish domination.

Believing some notice of the salient features which leprosy presents, as also a summary of the facts detailed, may prove interesting, we would here observe, that when visited by Dr. Webster in September, 1859, the establishment contained 53 inmates; 39 being male, and 14 female patients; showing that the former sex greatly predominated in number over the latter. This excess of male lepers has always prevailed, and experience proves that men are more frequently affected than women, in the proportion of about five to two at the least; while, in reference to age, among these 53 leprous sufferers there were individuals varying from a girl fourteen years old, and a lad not much more advanced, to persons of both sexes verging towards their grand climacteric. Again, as to the complaint itself, some patients appeared only recent victims, whereas others had been several years attacked; while all seemed slowly but surely advancing to a fatal termination.

Various cases have the mouth and tongue ulcerated, sending forth a horrible stench; their voice then becoming weak and husky, so that they could only speak in a whisper; while some were without an eye, or part of their face was eat away by extensive sores. Several had lost fingers, toes, and even a hand, in consequence of ulceration; whereby the poor sufferer became a horrid spectacle of mutilation and helplessness. Two or three were all but bedridden from their physical suffer-

ings or debility; and two formed such a mass of bodily corruption, that it would be difficult to give any description.

One particular phase of the mental faculties noticed in leprous victims deserves notice—namely, *they almost universally seemed happy, and even quite contented with their really sad condition.*

Another curious characteristic likewise merits record,—namely, numbers were very lascivious in conversation, and their conduct would have become equally objectionable, but for the strict surveillance constantly exercised to keep the sexes separate, since in both the "*libido inextinguibilis*" of ancient authors often constitutes a prominent symptom among such parties.

Regarding the particular districts from whence lepers at the Granada Hospital usually came, it may be stated that very rarely any were natives either of the city or adjacent "Vega," which is one of the most fertile regions throughout Spain. Almost all the patients being from places adjoining the low, south-eastern Mediterranean sea-shore, especially Almeria, Adra, Motril, Malaga, Velez-Malaga, or adjacent villages—Cadiz and its vicinity being also affected. Hence, the malady would seem as if especially obnoxious to marine populations, not persons who dwell habitually upon more elevated or inland localities.

Although leprosy is now very rarely seen in countries where formerly it proved exceedingly common, modern Spanish observers assert confidently that the malady has been lately increasing in number throughout various situations of the Peninsula; more victims of the disease being at present recognised than during the early part of the current century.

That the complaint still prevails to a considerable extent in some regions of Spain, appears to be conclusively illustrated by an instructive fact recently communicated to the Madrid Royal Academy of Medicine, by Senor Mendez Alveiro—namely, that 284 leprous patients were ascertained to be alive during 1851 in nine Spanish provinces, without reckoning many more about whom no statistical return had been procured, at that date, from the districts where they resided.

With reference to the causes chiefly influential in producing leprosy, although hereditary tendency plays, according to some writers, a considerable part, the author thinks such an opinion very doubtful if not erroneous. He further says, in Spain as elsewhere, the malady seldom, if ever, affects persons belonging to the middle or upper classes of society, but almost invariably attacks the poorly fed and badly lodged labouring population; particularly if living in dwellings which are damp, devoid of free ventilation, and whose occupants sleep on the ground floors, on in the same hovels with mules and donkeys, frequently wallowing among ordures, besides suffering from all the evils of indigence.

Besides these noxious causes specially adverted to by Dr. Webster, it would appear not only that innutritious diet acts powerfully, but even the kind of food which is consumed under such circumstances exerts a baneful influence. Thus, putrid fish, whereof residents near

the sea-coast oftener eat than persons dwelling inland, to a certain extent, may explain the greater frequency of this malady in maritime districts, compared with central and more elevated regions. Again, not only deficiency of proper nutriment is injurious, but eating diseased hog's flesh, habitual intoxication produced by deleterious "aguardiente"—bad, fiery brandy—consumption of old, mouldy grain, a scanty supply of vegetables, the want of salt, and abstinence from animal food, prove equally detrimental.

After discussing one or two other important questions bearing upon the loathsome affection here brought under review, but which space prevents our further alluding to on the present occasion, the author subsequently observes, although no expectation can be reasonably entertained of curing confirmed leprosy by remedies, or even of arresting its fatal progress after a certain stage, still something may perhaps be accomplished towards alleviating the sufferings of those victims who occasionally have become martyrs to such an inveterate and incurable disease.

Judging from the experience acquired at the Granada Leper Hospital it would seem through attention to diet, cleanliness, frequent bathing, and proper clothing, some alleviation of individual suffering may be occasionally accomplished; while the judicious employment of patients in manual occupations, according to their physical strength and individual capacity, by remaining much in open places, where refreshing, pure air may be breathed, aided by varied recreations, good effects are sometimes obtained. In short, the system pursued should mainly resemble that now followed at most well-regulated lunatic asylums. Of course local remedies must be also applied to ulcerated surfaces—usually soothing applications—while the medicines prescribed internally will comprise those chiefly of a tonic description. But in regard to anticipating any permanent beneficial result through medical treatment, such an expectation Dr. Webster considers as almost invariably nugatory. Speaking of the occasion when nearly fifty leprous inmates attended at chapel, during the performance of divine service, the author remarks rather feelingly that, at no public establishment of any kind ever previously inspected throughout Europe, had he witnessed such a disgusting sight as the spectacle these miserably afflicted fellow-mortals there presented to the eyes of professional or curious visitors. The disfigured, ghastly countenances of some, covered with deep, extensive sores: distorted features of others; the idiotic expression of many, and the feeble physical frames of most; at the same time that every person was then devoutly kneeling and engaged in prayer; formed altogether such a melancholy exhibition of frail humanity, that the scene baffled description, and therefore few persons would desire, it is believed, again to join in any similar ceremony, or one so lugubrious.

Finally, in concluding his notes respecting the Granada institution for lepers, of which we have now made a running commentary, in order so convey thereby some general notion of several salient points discussed in the present communication, Dr. Webster observes, according to numerous recognized facts contained therein, and which were all obtained from reliable authorities, that the following general inferences may be legitimately deduced:—

"1st. Leprosy chiefly affects the male sex, as it has always done heretofore.
 "2nd. Every age is liable to its attacks, but mostly that after puberty and during manhood.

"3rd. The malady is not infectious, in the strict sense of that definition.

"4th. It seems to be an endemic disease.

"5th. Occurs only among the lower and badly fed ranks of society, at present.

"6th. Residents on the sea-coast constitute its ordinary victims in Spain, as elsewhere.

"7th. The principal apparent causes seem to be putrid, indigestible, and nutritious aliment; also indigence, filth, and occupying insalubrious dwellings in marshy, miasmatic soils; or where a humid, variable marine atmosphere prevails.

"8th. Leprosy may be communicated by inoculation,—according to some authorities.

"9th. It is incurable when fully developed; hence in the latter stages, all medical treatment proves unavailing.

"10th, and lastly. Although the disease seems nearly extinct in districts where leprosy formerly prevailed extensively, and has almost disappeared from every other European country excepting Greece and Norway, it yet still exists to some extent throughout Spain; especially among poverty-stricken natives, who live either upon or near the Southern Mediterranean sea-shores of that Peninsula."

During the middle ages, and subsequent to the crusades, leprosy was an exceedingly common affection even amongst the highest ranks of society. For instance, Don Alonzo, King of Arragon, died in 1284, of that malady, and King Robert the Bruce, of Scotland, also fell its victim after several years' sufferings. So common was leprosy throughout Great Britain, that not many centuries ago, upwards of one hundred lazaret-houses existed in this country; indeed, the village of Libberton, near Edinburgh, derives its name from this disease being then very frequent, and hence originally called Lepper-town; while St. James's Palace at London, is said to have been first built as a receptacle for lepers. Now the complaint has almost wholly disappeared from Europe, with the exception of Spain and a few maritime regions where it still ravages the population; Greece, the sea-coast of Portugal, and Norway, being considerably devastated. In Iceland, likewise, according to Dr. Lindsay of Perth, leprosy exists to a considerable extent; and perhaps sporadically in other European districts. Therefore, its absence may be held as a sure indication of advanced civilization, in any country where so incurable and direful a disease proved at one period very rife and destructive among all classes of residents.

Year-Book of Medicine and Surgery, and the Allied Sciences, for 1860. Edited by Dr. G. HARLEY, Dr. HANDFIELD JONES, Mr. HULKE, Dr. GRAILY HEWITT, and Dr. SANDERSON, New Sydenham Society. London: 1861. 8vo, pp. 578.

This volume is a decided advance, both in arrangement and compilation, upon its predecessor, and it gives promise of a still better future. But why such a mis-begotten word as *Psychiatrik*?

The Clinical Teaching of Psychology. A Valedictory Address. By J. CRICHTON BROWNE, L.R.C.S. Ed., Senior President of the

Royal Medical Society of Edinburgh. Session 1860-61. Edinburgh, 1861. pp. 23.

An eloquent and instructive address from which we cull the following interesting paragraphs:—

“Once, indeed, in this country, long before the era of Pinel, clinical psychology promised fair to assume its proper position, for we find that one of the objects proposed at the foundation of St. Luke’s, in 1751, was that ‘of introducing more gentlemen of the faculty to the study and practice of one of the most important branches of physic.’ The enlightened physician of this hospital at that time, Dr. William Beattie, tells us, too, in the preface to his ‘Treatise on Madness,’ that, ‘by a unanimous vote the governors signified their intention of admitting young physicians, well recommended, to visit the hospital, and freely to observe the treatment of the patients confined.’ But Dr. Beattie was far in advance of his age, and immediately after his death a retrograde movement in psychological matters took place. At this we cannot be surprised, when we remember that this was almost coeval with the time when Samuel Johnson, himself not free from the gloom of mental disease, and Foote, enlivened themselves with an occasional stroll among the lunatics of Bedlam, or with witnessing a hanging or judicial flogging; and when swarms of schoolboys paid twopence during the Easter holidays to see ‘the fools’ in the same hospital. This institution is said to have derived at one time an income of 400*l.* per annum from the exhibition of its inmates.

“Tracing the history of clinical psychology in England, we find no further effort at such tuition made for nearly a hundred years. In 1842, however, St. Luke’s again opened its wards to students, and in the same year Dr. Conolly commenced lecturing at Hanwell. Dr. Sutherland and Dr. Hitchman have also lectured upon insanity; and now almost every English asylum receives a limited number of resident pupils. In Germany, clinical instruction in psychology appears to have originated with Horn, who lectured at Berlin in 1818. Horn was succeeded by Newmann, and Newmann by Ideler. Müller, Conradi, and Frank have also lectured on psychology in Germany, having illustrative insane cases introduced into their ordinary hospitals. Now, too, young medical men are admitted into some German asylums.

“At an early period in the history of reformed psychology, the celebrated Guislain gave lectures in Belgium which were afterwards collected and condensed into his valuable ‘*Leçons Orales*,’ whilst in Holland, Van der Kolk has strongly advocated the necessity for the study of mental disease.

“In France, perhaps more than in any other country, progress has been made in psychological teaching. Pinel having inaugurated a new *régime*, and introduced humane principles into asylum discipline, gave lectures on his favourite study, having as illustrations patients in Salpêtrière. This he did about 1814, and was followed in a few years by Esquirol, who lectured at the same hospital, and afterwards at the royal asylum of Charenton. M. Ferrus, M. Bottex, and M. Rech, have all been psychological teachers in France. M. Baillarger and M. Falret, both so well known in this country, have also contributed to the advance of psychological science by instructing in it, and France possesses many other distinguished lecturers upon insanity.

“In Scotland, the first lectures on the subject of insanity were those delivered by the venerable Sir Alexander Morrison, in 1827. They were so far clinical that they were illustrated by drawings of striking cases which had occurred in his own practice—a mode of teaching then a novelty. These pathognomical pictures furnished part of the drawings in Sir Alexander’s large work.

“In 1836, Dr. W. A. F. Browne gave a course of five lectures at the Montrose

Asylum. They were sanctioned by the directors, but heard by a promiscuous audience, and were regarded as a bold step. They form the volume, *What Asylums were, are, and ought to be*. In 1840 we find the author of this work, in one of his annual reports, advocating systematic psychological teaching. We quote the passage, as it was the first shadowing forth of a principle which has since been widely adopted. After enumerating the high qualities necessary in a medical superintendent, he writes:—‘Acting upon the conviction that such qualifications can rarely be found combined, and can only be acquired by long training and experience, it has been proposed to render the Institution a clinical school for the education of young medical men who propose to make insanity a special study. Under certain restrictions one or more students will be admitted as assistants to the physician, who will thus have the inestimable advantage of living among the insane, of watching and becoming acquainted with their habits of thinking and acting, and of performing every office which kindness dictates or treatment demands. For obvious reasons the whole of an asylum cannot be thrown open to all students indiscriminately, however desirable in some respects such an innovation might be; and these assistants are accordingly required to have received some instructions in medicine previous to their appointment, to be articulated pupils of the superintendent, and to be members of the household.’ In 1851, Dr. Browne again gave a course of lectures to his medical assistants at the Crichton Royal Institution, Dumfries, instructing them in the observation of mental disease, and teaching the application of the principles of philosophy and medicine in the modes of treatment now employed.

“In Edinburgh, for many years the absence of any systematic course of lectures on mental diseases constituted a great defect, but we have now two distinguished lecturers on the subject. Dr. Skae, the justly eminent superintendent of Morningside, commenced lecturing several years ago, and has since continued to give an annual summer course, which may be attended with much profit, not merely by students having Indian service in view, but by those entertaining other projects. It consists of systematic lectures on mental diseases, and visits to the asylum, where characteristic and striking cases are met and conversed with, and where the principles of asylum construction are demonstrated.

“Professor Laycock began giving a special summer course in 1859; but he had previously been in the habit of incorporating a series of lectures on insanity with his winter course on Practice of Physic. I would be lacking in diffidence were I to speak of Professor Laycock’s ability for the task which he has imposed upon himself in so disinterested a manner. I will only remark, that his profound and extensive knowledge of philosophy, combined with his distinguished professional attainments and his experience, acquired whilst physician to an asylum in England, renders him peculiarly fitted to act as a teacher of psychology. The University of Edinburgh is deeply indebted to him for supplying what was an obvious defect in its medical department, by a course at once theoretical and practical.

“After all that has been said, we must surely be astonished that such ‘a glaring anomaly should still exist as the exclusion from the prescribed course of study of one of the most important diseases in the whole range of nosology, and one which every practitioner must, sooner or later, meet in his every-day business.’* The consequences of this exclusion have been felt by some of the

* “In illustration of the growing and acknowledged necessity for incorporating special inquiry into mental diseases with general clinical instruction, I may mention that Professor Bennett, my distinguished teacher, since these words were delivered, has greatly enlarged his consideration of the subject in his clinical course.”

most distinguished of our profession. The illustrious Dr. Alison, some years before his death, caused a psychologist to describe to him, at great length, the general paralysis of the insane, which he had never recognised; and very recently, gossip says that another psychologist was requested to read a monograph on the same subject, to a learned Society, the Medico-Chirurgical of this city, for the special behoof of its members. It is to be fervently hoped that a remedy for the evils which we have attempted to point out will be speedily applied. Some continental schools have, in this matter, set us an example which we would do well to follow by establishing regular clinical psychological courses. Perhaps a sanguine spirit may attribute to the unification and nationalisation of Italy, that a Psychological Clinique has been established in the University of Bologna, by a decree dated December, 1860."

Suggestions concerning the construction of Asylums for the Insane. Illustrated by a series of plans. By WILLIAM DEAN FAIRLESS, M.D., &c., Resident Officer in charge of the Old Royal Lunatic Asylum of Montrose. Edinburgh, 1861. pp. 28.

We commend this pamphlet to the attention of all who are interested in the provision of Asylum accommodation for the insane.

Statistical Report of Cases of Insanity treated in the Retreat, Castleton Lodge, near Leeds, and after its removal in June, 1858, at Mount Stead, near Ilkley, from Jan. 1st, 1850, to Dec. 31, 1860. By G. PYEMONT SMITH, M.D. Edin., Resident Proprietor of Mount Stead, Lecturer on Medical Jurisprudence at the Leeds School of Medicine, &c.

Dr. Pritchard, of Abington Abbey, set the excellent example which in this Report is followed by Dr. Pyemont Smith. Dr. Smith has adopted the forms of tabulation made use of by Dr. Pritchard, "as more suitable," he writes, "than any other I could have substituted." We trust that other asylum proprietors will enter the course so ably pursued by these two gentlemen. But we would suggest the propriety of appending a summary of the most important results to any subsequent reports.

The Errors of Homœopathy. By DR. BARR MEADOWS. London: 1861. pp. 45.—A vigorous exposure of this form of charlatanism.

We have also on our table a third edition of Dr. Brinton's admirable little work on the *Medical Selection of Lives for Assurance*; Dr. Halford's ingenious, but most brief observations *On the Time and Manner of Closure of the Auriculo-ventricular Valves*; the *Introduction to Swedenborg's Economy of the Animal Kingdom*; with address to the reader by Medicus Cantabrigiensis; the Rev. Edwin Sidney's *Second Visit to Earlswood* (June, 1861); Dr. Billod's *Relation d'une Visite à l'Asile des Idiots d'Earlswood, suivie de quelques Réflexions sur le no-restraint*; and of reprints, Mr. Dunn on *Medical Psychology*; Dr. Toulmin, *On the Importance of the Functions of the Skin in the Pathology and Treatment of Tubercular Consumption*; and Dr. Cormac's *Metanoia; a Plea for the Insane*.

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FOREIGN MEDICO-PSYCHOLOGICAL
LITERATURE.

OUR Retrospect of current Medico-Psychological Literature will embrace the following subjects:

1. On the Moral Responsibility of Lunatics.
2. On the Statistics of Insanity.
3. On a case of Epileptiform Convulsion.

1.—*On the Moral Responsibility of Lunatics.*—By DR. H. BELLOC, Superintendent Physician of the Department Asylum of Alençon (Omer).

IN the April number of this Journal we recorded certain conclusions of Dr. Belloc upon this subject. In the last number of the *Annales Médico-Psychologiques*, Dr. Belloc, *apropos* of a medico-legal report on a case of parricide, discusses the bearing of his opinions upon the duties of the alienist physician in the witness-box. He remarks first on the unfortunate antagonism which too commonly arises, in questions of lunacy, between the representative of medicine and the representative of the law. The source of this antagonism Dr. Belloc seeks in the different significations which the medical man and the lawyer persistently attach to the terms used in law to designate lunacy, and to the false position which, as a consequence, is so frequently forced upon the former by the requisites of special pleading. The one refuses to recognize lunacy except in its medical sense; the other except in its legal. Dr. Belloc then proceeds:—"If it were a question of seeking scientifically and theoretically the distinctive character of mental alienation without regard to any determinate application, the physician would be right. He would then only be concerned with the nature of the malady without reference to its extent, and would be obliged to pronounce the man mad who is under the dominion of a single delirious fancy, as much as another who has reached the last stage of distraction. But he does not do so. In fact the question of extent becomes of supreme importance and decides the whole question.

It, alone, gives to an act its true character, and is the measure of its morality. It is for want of making this fundamental distinction that physicians, in my opinion, have been beside the question. The minister of public affairs does not ask us whether the accused person, whom he presents to us, would be declared mad by the testimony of a *concourse* or an academy! To examine things thoroughly, he does not first occupy himself with that; but with a very different assertion that the culprit, in committing the act of which he was accused, 'knew what he was doing, and might have prevented himself from doing it.' And we doctors, of this simple practical question make a nosological question, and we think we have answered it when we say, the accused person is under delusion on this point, therefore he is mad.

"That which astonishes me is, that the magistrates have not till now perceived the logical error involved in this *passage d'un genre à l'autre*, which we have for so many years invariably committed. They have not seen that we answer that which they do not ask of us, and that we do not answer that which they do ask. Hence the indefinite prolongation of *quid pro quo*; hence the interminable antagonism between the opinion of the bench and the opinion of the physician; an antagonism which puts to the rout good faith and good sense, and which scandalizes the populace, which is carried so far that nothing is seen but the strife of self-conceit and party-spirit in that which is in reality only the necessary consequence of a misunderstanding.

"The magistrate and the physician are here, each on his own side, victims of an educational prejudice, which causes them both to hesitate in saying all that they think. In a great number of cases the first sees clearly that the accused advances certain eccentric, extravagant, and, at least, singular ideas; but, in his sympathy with popular indignation, he refuses to recognise in these the real signs of madness; for, he thinks, if I allow that the accused raves on a single point, it will be decided, *ipso facto*, that he is not guilty, and I believe in my soul and conscience he is guilty! The physician, on his side, sees clearly that the accused has considered his act; that he has discussed it with sagacity; that he has weighed its consequences; that he has calculated the necessary means; that he has decided on it, and perpetrated it, with absolute determination to do it. But, he says to himself, if I allow that, he will be judged as if he was not mad; and in my soul and conscience I believe him to be mad!

"We may see how, on this ground, or, we may more justly say, on these different grounds, the two adversaries can never meet each other.

"How then can we bring them face to face in a way that the arguments will justify, in order to bring truth to light, and to ensure the triumph of justice, to which all other interests should be sacrificed?

"Nothing, in my opinion, is more simple. It is only necessary to abandon the fictions that have so long taken the place of realities—the absolute definitions that have made a malady according to programme, a malady all of a piece, of a series of pathological alterations

essentially diverse, essentially variable, and essentially varied in their intensity, in the mode and in the number of their manifestations, as they are varied in their causes. It is sufficient to declare frankly and loudly that nature does not recognise the rectilinear limitations in which the feebleness of our intelligence takes refuge; that she does not regulate her acts to accommodate our classifications; that nothing is more rare than absolute dementia in a legal sense; that the greater number of lunatics, although really lunatics, retain for many of their actions the whole, or a part, of their free-will; that physicians can say only that which is the result of their own observations, and that, consequently, it cannot be reasonable to question whether such and such accused person is absolutely wise or absolutely senseless, absolutely responsible or absolutely irresponsible. But *what are in his case the limits within which society may, without injustice, expect him to account for his actions?* Then magistrates and medical men will be able to discuss the question with the hope of understanding it; then will become more and more rare these arguments without issue, these condemnations without mercy, and these unhappy acquittals which, too often, cause the true friends of humanity to tremble.

“Let not my brethren condemn too hastily my opinion, though it may astonish many of them. I believe a little reflection will render it less paradoxical in their eyes.

“There is nothing new in what I have just said, except the application I have made of a truth well known to every physician who has lived in an asylum. What would become of us who have the management of the insane if the doctrine of absolute irresponsibility should prevail for an hour? Is not all our influence, all our conduct based on the capacity of the insane to understand the counsels given to him, and the reprimands addressed to him, and to control himself accordingly? Every day in the asylum of which I have the management I praise, I reward, I blame, I constrain, I threaten, I punish; and why? am I then myself an idiot?

“And that which I do all my colleagues do also, and from the very necessity of the case; and what does this prove but that the threat of a punishment, that the assurance of a real responsibility may combat, perhaps effectually, in the minds of certain lunatics the first delirious idea, the first thought of a crime, before it has entirely mastered the powers of resistance. And that if certain lunatics are not so guilty as the magistrate supposes, no more are they altogether innocent, as is asserted by the physician.

“In the face of these incontestable facts, in the face of our daily practice, what becomes, I ask, of the doctrine of absolute irresponsibility on which we insist in a court of justice? In truth it is not believed in, and I can only explain this flagrant contradiction by the spectre of the guillotine which the minister of public affairs continues to hold up before our eyes. In the presence of this supreme danger, which is incurred by one class of our invalids—the class in whose safety we feel ourselves most interested, it has appeared to us that we could not do too much to avert it, and in the fear of failing to accomplish our end

we have, without perceiving it, passed beyond the limits of reason and justice. Fearing that the hesitation of our mind might damage our cause, we have endeavoured to conceal it, and not being able to fix with absolute certainty the responsibility incurred, we have declared that there was no responsibility at all. This is, I think, the secret, and the excuse of the logical mistake into which we have fallen.

“But we cannot persist indefinitely in this sophism, and it is time, and it is only strict justice to recognise in law that which we have for so many years recognised in fact.

“Besides all this, to avoid self-deception, I request once more the attention of my colleagues. Besides the question of equity, I find here involved a question of philanthropy. The doctrine of irresponsibility which seems at first sight so favourable to lunatics, has in reality done them more harm than all judicial errors put together. Is it not this doctrine which has originated the *régime* of grated cells and chains of iron?—the only mode of management that can be logically employed against those individuals who are regarded as absolutely incapable of self-control—as nothing more than brute beasts. And, in relation to the number and in relation to the magnitude of the evils endured, what are the victims of judicial errors compared with the victims of chains and dungeons? Two men, whom I associate in the same honour, as I do not know whether one was anterior to the other, Pinel and Daquin, have attempted the task of putting down this frightful system; and what has been their *point de départ*? They commence by affirming, after long and attentive investigation, that the greater number of the insane are not, as was formerly supposed, mere machines; that they are accessible to reasoning, to good sentiments; that they can, in the greater number of cases, distinguish the true from the false, the just from the unjust; that they possess in consequence a certain amount of moral freedom. This being the case, reform becomes practicable, otherwise it is an absurd impossibility.

“Unhappily this starting-point has escaped the notice of the successors of Pinel; and I venture to say, notwithstanding the respect I have for them, that it is for want of returning to the inspiring thought of their master, that stopping half-way on the road that he has indicated, they have allowed themselves to be again entangled in the doctrine of absolute irresponsibility, while they strive to resist its consequences.

“This error in contravening their benevolent designs has embarrassed the manifestation of these designs, and has prevented them, in spite of all their efforts, from rising to any higher conception than that of an actual asylum. Heaven forbid that I should deny the services that have been rendered by these establishments. I am glad to proclaim my affection for them and my admiration for their founders; but while I heartily acknowledge the amelioration that they have introduced into the *régime* adopted in former days, I cannot avoid the conviction that they perpetuate its traditions; what is in fact the system of barrack accommodation that they adopt but a sort of prolongation of the chains of former times? Nothing can prevail against this fundamental defect—neither the benevolent intentions of ministers and

magistrates, nor the confiding generosity of general councils, nor the devoted attention of medical men. All principles must necessarily bring sooner or later the consequences by which they will be judged; and the system under consideration, after having procured to the insane a little more air, a little more light, a little more relative liberty, more regular meals, more frequent change of linen, and other improvements of detail, what has it produced after all? It has produced that which it might be expected to produce, that which was logically, fatally contained in its systematic divisions, in its paved courts, in its regular colonnades, in its enclosures of high walls, the material expression of its starting-point; it has produced an administration altogether mechanical, with which I will not concern myself at present. It is sufficient to say, in order to establish that which I have advanced, that in extinguishing all variety, in stifling every germ of innovation, it supposes that the last word is said upon the arrangement and the management of asylums; that by it they are rendered immoveable, and condemn generations on generations of insane to perpetual incarceration. Can such an embargo upon the development of the views of Pinel and Daquin be intended by the supporters of these two friends of the insane?

“Let not, then, an ill-understood philanthropy arrest our progress. Let us fearlessly remove the evil spread before our eyes which hides from us the truths evident to simple common sense. In doing this, far from injuring those whose cause we advocate, we cannot fail to be useful to them. In declaring that the lunatic can and ought in certain cases to bear justly a part of the responsibility, I am well aware that we partially condemn the partially guilty who on theory would be declared innocent; but at least in turning our back on the past, we shall have opened the door not only to simple improvements but to a true reform—a reform real enough this time—a reform indefinitely progressive, for it has its principles in nature itself, and wants only time for its development. We shall, in fine, have prepared in the future for the greater number of insane a *régime* of dignity, of liberty, of domestic life, of family affection, of well-being, and of physical and moral development, of which the theory of irresponsibility and its necessary mode of application deprives them now even of the hope.”

2.—On the Statistics of Insanity.

A WRITER in the *American Journal of Insanity* (July, 1861), offers the following suggestive remarks on this subject:—

“It has not been sufficiently considered, we think, that the subject of insanity has two widely different aspects, whence it is to be studied from separate, and in some respects opposite, points of view. These are the medical, and the social or political. The practical and administrative parts of these two divisions cannot, and need not, always be separated, but their scientific relations are entirely dissimilar, and, we are convinced, can only be studied apart from each other with any prospect of success. This will be evident from a brief view of the subject of statistical records respecting the insane. We have

already referred to the origin of statistical science, and need only allude to the rank which it has attained in the forms of abstract as well as of applied knowledge. It has survived the attacks of ridicule and abuse, until it has come to be acknowledged as the only safe basis of social and governmental reform, of commercial enterprise, and indeed of all the grandest schemes of human progress. Books of statistics, instead of being what Lamb once wittily, and with something of truth, termed them, 'books that are not books,' are now much more truly those from which, or because of which, books are made. But statistical science is not, as seems too often supposed, a mere record of heterogeneous facts. This were indeed 'learning made easy,' to the meanest intellect. The facts of statistics must, in the first place, be such as are capable of being reduced to numerical expressions with a degree of exactness. These, of course, are only of the most general and collective classes. In proportion as facts become less general is their statistical value reduced, until we reach the individual and special classes, which are worthless. Again, facts should be collected and arranged with a knowledge of the purposes to which they are to be applied. A consideration with which idle collectors of empty facts often flatter themselves is, that the statisticist must not deal with application or speculation, which would unfit him for observing properly. True, it is not the part of the statisticist to combine or to apply facts, but it does belong to him to point out how they may be combined, and what principle must govern their application. The neglect of this has done much to bring the method into disrepute, and to give rise to the saying, that 'anything may be proved by statistics.'

"Let us now look at the forms of statistics usually adopted in the specialty of psychological medicine. And, as at once the most convenient and the most perfect collection of the kind recently made, we will first take the abstract of 'Statistics of the Establishments for the Insane in France, from 1842 to 1853 inclusive,' published in this journal for April 1860 and 1861. A highly centralized administration, having for its head in each department the first scientific men of a country, must ensure the great advantages of a thorough system of records, and the selection of competent observers. Now the number of institutions for the insane of a country, their capacity, their mode of support, increase, distribution, population, with their admissions and discharges at a certain time, and at regular periods, are seen at once to be capable of exact numerical expression, and when compared with such other facts as the whole number of insane, and the total population, afford the most perfect guide to the legislator and the political economist. This is one kind of the facts given, and is truly a matter of state or collective concern. Another class has an indirect importance of the same character. These are such as the nativity and residence of the patients, the numbers recovered and not recovered, the number of re-attacks, and the number of deaths. They do not, like the others, point to necessary conclusions, but they afford ground for more or less probable inferences, which may be tested by other series of facts, and these by others still, according to the degree of complexity in each

case. In the nativity of patients, for instance, there can be no direct practical interest. The spot of earth upon which an individual was born, can have no more relation to a state of mental disorder in his case, than the shape which the clouds will assume on the day of his death. The fact of race, which might be implied, could have little greater pertinency. Yet by comparing the number of insane of a foreign with those of native birth, and comparing the total native population with the whole number of immigrants, and in a similar way guarding against several obvious sources of fallacy, an inference might perhaps be derived, in the most general terms, as to the health and vigour of the entire foreign element from which the number of insane were derived. Still, it is plain that our statistics would be only an indirect and unimportant contribution toward such an estimate.

"The third variety of facts contained in these statistics comprises all those concerning the vocation, degree of education, civil condition, residence, sex, age, season of attack, of recoveries and of deaths, vocation of recovered and of deceased, and other similar particulars. We have omitted to include the etiological records, which will be hereafter noticed. Now let us ask ourselves for what purpose these facts have been drawn out with such an ingenious minuteness. Their collocation cannot be based upon any principle of statistical science. They can be recorded numerically, but figures carry no virtue not contained in terms; and the common principle by which they are possibly connected must be expressed, before the first step in their combination is made. For it is to be remembered that no useful observation is possible, except as connected with some known or assumed principle which is present to the mind of the observer. Bald facts, without some hypothesis to co-ordinate them, are the merest rubbish. Even in physical science, where general laws are so accurately known, and deductive conclusions do so much to guide the student, still some hypothesis must attend upon the severest inductive processes in the discovery of special laws. How much more, then, do we need theory in organic science, whose most general laws are beyond our grasp. We have in meteorology a science whose foundation principles are capable of the most exact mathematical expression, but whose data are so extremely numerous and complicated as to render its progress by pure induction quite impossible. Who does not know the large use which is made of theory in the pursuit of this study? Yet in the study of mental phenomena, whose data are infinitely more complex, and whose primary laws are unknown, we are cautioned against anything beyond the merest record of facts.

"If any proof were wanting of the extreme fallacy of the grouping of facts in connexion with insanity, like those which we are now considering, it might be found in the comments which accompany these statistics. As though with tacit assent to their meaningness, their obvious meaning is coolly reversed or negatived whenever—as is often the case—it is contrary to, or not confirmed by, the preconceived views of the writer. Thus instead of affording a test to theory, these facts are merely the excuse for offering endless hypotheses in their explanation. Let us take, for instance, the first table in the second

part of the article referred to as given in our last number. This table shows that, during a given period, the yearly number of discharges from French asylums gradually diminished. Now the data given here we suppose to form a part of the true statistics of a country. Taken together with the facts that the admissions to asylums for the same period had increased nearly 300 per cent., and that the number and capacity of these institutions had increased to a definite extent, we have a reliable basis for a few general statements of certain value. But M. Legoyt evidently fears that, as is the manner of psychologists, we must infer from these data a decreased efficiency of treatment, and thence goes on to explain as follows:—

“We regret that the documents do not furnish the means of determining exactly whether this reported diminution belongs to the patients discharged before or after recovery. Still, we do not hesitate to admit the former hypothesis, and conclude that many were discharged before their complete recovery would warrant. For, on the one hand, it is not easy to believe—especially when we take into account the new therapeutic resources and the increased comforts which belong to nearly all modern asylums—that the treatment of the insane is less effective than formerly; and, on the other hand, it is probable that families, appreciating more fully from day to day the great advantages of these institutions, are more and more disposed to maintain their friends in asylums, even after they may be acknowledged as incurable cases.’

“The table above referred to also shows what is termed ‘a very interesting fact,’ which is, that the percentage of discharges from asylums has been greater among males than among females. Instead of noticing this as a natural consequence of the larger yearly number of male admissions, the writer observes that ‘the explanations of this excess offered by directors of asylums have been various,’ and proceeds to enumerate some of them; but he himself questions ‘whether we ought not rather to attribute this difference to the greater or less severity of the disease itself, depending upon the difference in causes which induce insanity in the two sexes.’ Here is implied the error which has been before alluded to, of comparing things numerically which can have no numerical expression. The terms insanity, disease, and cause—when the latter is predicated of vital phenomena—are not entities which may be dealt with by numbers. But we shall have occasion to allude to this again. It is enough to say, there is no ground in reason or analogy for the primary assumption that sex has any necessary and positive relations to insanity. The presumption is, then, that it has none; and there is nothing in all the figures which have accumulated upon the point to weaken that presumption in the least. Yet the table giving the number of admissions according to sex, M. Legoyt says, ‘seems to settle the question’ of the relative liability to mental disease. It has been thus settled, as our readers are well aware, very many times, on one side and on the other. Will not some enterprising statistician at length draw up these opposite conclusions numerically, and strike a balance which shall be final—until the next report of asylum statistics is published? Yet it is

satisfactory to see that, at points where we might expect some such absurd inference as the above, the writer is very happy in the common-sense explanations to which he limits himself, and which are, as he says, 'wholly independent of psychological influences.'

"The fallacy, or rather the folly, of this array of heterogeneous facts in the name of the numerical method, may be further illustrated by the various tabulation of the ages of patients, with the several particulars of admission, recovery, death, &c. This comparison is made because of the hypothesis that age has an influence in the development of insanity. Now what shadow of excuse is there for any such supposition? It is proper that we should be reminded here, that an empirical etiology has always gone before a scientific one, which has had only to render the former more exact and certain. Centuries ago the Father of Medicine remarked that phthisis was most commonly developed between the ages of thirteen and thirty-five years. The widest statistical records, made within the last century, have simply served to render this relation in more precise terms, and to refer to an imposing mass of figures as its proof. This may have been of some use in the construction of life tables, although to medical men it can have only an infinitesimal value. But no physician, from the time of Hippocrates down, has observed that insanity belonged to any particular time of life more than another. And this is not to be wondered at, when the vaguely defined condition which we call insanity is contrasted with phthisical disease. Death and certain organic lesions are the test in one case. What it is in the other, who can yet tell us?

"We may mention here a curious instance of the empirical suggestion of causes in insanity. Probably most of our readers have looked over the numerical inquiries once made into the supposed influence of the moon in causing mental disorder, and in varying its symptoms. The observation of numerous and intelligent persons upon this point for centuries was enough to prompt the most searching and methodical inquiry. The statistics, if we recollect aright, indicated some sort of connexion between the moon's phases and morbid mental symptoms much more strongly than have those of the various accidents of age, sex, vocation, &c., with the same. But these coincidences were explained away, to the satisfaction of nearly all except the most ignorant and superstitious. This came, of course, in the progress of astronomy. In spite of statistics, and, indeed, of superficial observation to this day, the theory of lunar influence has ceased to receive attention. Have we not advanced far enough in meteorology, if not to create a disbelief in the effect of climatic changes upon insanity, at least to convince us of the utter hopelessness of further inquiry? Add to the immensely numerous and complicated data of this science the intangibilities of mind in its most perplexing manifestations, and do not our records which give the admissions, deaths, &c., according to season and month, appear fanciful to the last degree?

"To other statistical heads of the same character as the above we will only refer. The tables of civil condition, vocation, and education are the principal ones not already noticed. It is safe to say that not one of them has contributed a useful suggestion in behalf of true

science, and the appeals for popular effect based upon them, serve far more to bring discredit upon the speciality than for any good purpose. Most of these were observations begun in the ill-informed zeal which attaches to all new methods, and it appears to us without foundation in rational knowledge. Be this as it may, they have been long tried, are entirely without promise of fruit, and may justly be abandoned or greatly modified for this cause.

"In all but the first class, or that of true statistics, according to the division made at the beginning of this article, we have been dealing with proposed aids to the etiology of insanity, although the table of causes is usually only one of twenty special tables in our reports. It will not be necessary to dwell here upon the pre-eminent importance in a medical point of view, of the study of the causes of mental disorder. We are forced to recognise that the morbid phenomena of mind, more than any other class of symptoms which we are called to notice, represent a most profound and radical type of disease. The most marked diatheses, as the scrofulous and nervous, representing the accumulated results of morbid causes perhaps through many generations, may still undergo one further transformation in the downward series,—into mental disease. There are, of course, numerous exceptions, in the temporary disturbance of the cerebral functions by toxic agents, or severe moral shocks, but, as compared with the number of cases in which insanity marks the farthest reach of vital degeneracy, they are but few. To the medical man, therefore, the chief problems of mental disease are of necessity those which refer to its prevention rather than to its cure; and hence the study of causes is of the first and almost exclusive importance.

"But it must be admitted that the manner in which this class of investigations has been pursued, as appears in a large number of asylum-reports, and even of special treatises upon the subject, is the most unpromising, and even absurd, of any arising in the speciality. To say that the certainty with which one phenomenon brings another to succeed it is that which establishes causal relations between them, and not the intimacy of their relation in time or space, seems trite enough; but when we glance at the multitude of hypothetical causes which are stated in our etiological tables, it is sometimes difficult to say what we have better than was found in the days of the belief in astrology and demoniacal possession. If we are to avoid all theory in the observation of causes, and simply to record facts, must we not record all the facts, or how shall we discriminate? In the case of a patient who first exhibits what, in the judgment of the observer, is an insane manifestation during a thunder-storm, is the cause to be given as lightning, or thunder, or tempest, or flood? or is it a moral cause, as anxiety or alarm? Accidents of this sort are constantly stated as causes, and such an instance as the above is by no means an extravagant one. If any of these circumstances are given, certainly none of them should be withheld. But why should the record of any or all of them be the principal, or, as is sometimes the case, the sole, aim of the observer? In a particular case of insanity, we seek the expression of a cause for the sake, mainly, of prognosis; in general, we study etiology in order

to find preventive means. It is needless to say that no one seriously supposes meteorological phenomena to contain the elements of a prevision of cerebral symptoms, any more than he does that planetary aspects control the virtues of medicinal herbs. Neither does he intend to urge the necessity of abating thunder-storms, or any of their incidents. We hope to be excused for seeming to trifle here, but we are at a loss how else to comment upon the grave burlesques of scientific forms which the subject calls before us.

"Yet, unfruitful as the etiology of mental disease has hitherto been, and absurd as the tabular forms which have been applied to it, we believe that in the study of development—aided if necessary by tables whose figures may serve to condense simple facts bearing upon some sober hypothesis—is the main hope of progress in mental medicine. It would not probably be necessary, if it were in place, to defend such a belief here, as it has been impressed upon our readers in all the most recent and important works upon insanity. Nor shall we endeavour to give even the outline of a scheme of our own for the study of this all-important but most difficult subject. Certain it is, however, that no single line of inquiry is to be relied upon in so complex and intricate a matter. Our efforts must be moderate and patient. Accepting only the most positive facts, these must be grouped in every possible way, to present the many-sided aspects of cerebro-mental disease. An important step in this direction has lately been made by the celebrated French psychologist M. Morel, in his *Traité des Maladies Mentales*. This author entirely rejects symptoms as the basis of classification in mental disease, and designates the forms of insanity according to causes. Acknowledging the present imperfection of this scheme, he yet, and we think correctly, believes that by thus concentrating the attention of the physician upon the etiology of insanity, a most important point is gained. A brief analysis of his work, in the number of this journal for October, 1860, gives a general idea of the proposed classification, and we hope that the views of M. Morel will gain the attention of every one interested in the progress of psychology. It will be seen at once, how much more condensed, simple, and definite the matter of our tables of causes would become were this method of record adopted. The group 'hereditary insanity' would take the first place, and, through its several classes, receive that especial attention which its great importance is acknowledged to demand. Next in order is 'insanity the effect of toxic agents,' in the widest sense. That all the numerous varieties of this large group must and do tend to develop a certain type of symptoms, will be admitted by the scientific observer. It would comprise narcotic, alcoholic, malarial, puerperal, mineral, and food poisons. The third group, 'insanity caused by the transformation of certain nervous disorders,' would include a large portion of those cases now attributed in such an indefinite way to 'ill health,' and numerous other more or less remote sources. By thus bringing together in large groups the causes of insanity, it will be seen that the tendency is to direct attention mainly to predisposing or efficient causes, to the neglect of the infinite variety of accidental ones.

"But we will not transcend our province by doing more than to

point out the direction in which it seems possible some changes in our theory and forms of asylum-statistics might be advantageously made. If it be said that our hints are chiefly in limitation of the present methods, we remember that Drs. Bell and Ray, than whom there are no higher authorities in this or any country upon the subject, have wholly denied the value of the numerical method in insanity, and present only the general statistics of the institutions which have been under their charge. In fact, it is too often found in asylum reports that their professional value is inversely as the length and variety of the statistical tables presented. We do not, however, desire to see all numerical forms abandoned in the study of insanity. The 'medicine of the future,' in many of its departments likely to become almost wholly preventive, and thus of a public and general character, must owe more and more of its progress to statistical science. Let us by all means continue such records as have at present any rational value, and let us adopt such other forms as the strict rules of scientific observation will warrant. We may remember that in whatever department rude knowledge has been already developed into science, figures have been without exception the agents of this change. It was by means of a numerical scheme—the atomic theory—that chemistry was raised at once to the rank of an exact science, and the most important applications to medicine and the arts became possible. Indeed, that exactness of any form of knowledge which gives to it the dignity of science exists just in the degree that numerical expression may be given to it. We have no right to deny the possibility that the beneficent aims of the physician may one day be firmly based upon scientific principles, nor to abate the most earnest efforts towards the accomplishment of so important a work."

3.—*On a Case of Epileptiform Convulsion.* By Dr. DANIEL AYRES.

At a meeting of the Brooklyn (U.S.) Medico-Chirurgical Society, in June last, Dr. Ayres brought before the members the subject of the following highly interesting case:—

"In the early part of August last, this lad received a blow from a stone, which inflicted a lacerated wound over the right frontal eminence. His immediate symptoms were those of concussion, followed by vomiting and headache, from which he soon recovered, whilst the wound, after suppurating, healed by granulation, leaving a marked cicatrix, elevated by the permanent thickening and induration of subjacent tissues. In the month of October following, and shortly after the wound had closed, the attention of his family was attracted by the marked change which had taken place in the boy's disposition and character.

"Hitherto he had been peculiarly mild, gentle, and tractable, but gradually became irritable, peevish, morose, and occasionally showed great violence of temper upon the slightest provocation, and a dispo-

sition to cry frequently. These paroxysms of excitement were soon accompanied by vertigo and headache, with increased disturbance of his general health. Whilst standing, at such time, he would reel and stagger, occasionally losing all consciousness, and falling down, his countenance becoming very pallid, but no spasm or frothing at the mouth were noticed. During the intervals, his demeanour and aspect were mopish and sluggish; his appetite capricious, and bowels persistingly torpid; his gait was unsteady, with a tendency to trip and drag, rather than raise the left inferior extremity.

"The boy had been very properly removed from school, and submitted to judicious and appropriate medical treatment by his attending physician, Dr. Cullen; but no control was apparently gained over the symptoms, which became steadily more aggravated up to the ensuing February, when he was admitted to the Institute.

"A careful inquiry into his condition and history at that time, seemed to justify the suspicion that the original injury inflicted upon the skull, if not accompanied with fracture of the internal table, had, at least, given rise to serious consecutive changes within, and this suspicion was strengthened by the permanent and decided elevation over the seat of injury. Although unable to define the precise character of this lesion, all were of the opinion that the increasing severity of the symptoms justified an attempt to relieve them by what appeared to be the only rational procedure, viz., the application of the trephine. Perhaps we were more than usually urged to this conclusion by the unfortunate termination of a case of recent occurrence in this city, almost identical in its causes and manifestations, in which the post-mortem examination (kindly furnished by Dr. John Cooper, who witnessed it) revealed a depressed stellated fracture of the internal table, which had gradually superinduced disease of the membranes, and fatal pressure on the brain.

"An operation was accordingly performed on the 9th of February last, by dissecting up a quadrangular flap of integuments, including the cicatrix in its centre. The conical trephine (recently brought again to the notice of the profession by Dr. Galt) was applied, and most satisfactorily fulfilled all the advantages claimed for it. For notwithstanding the youth of the subject, and the unequal thickness of the button of bone (from one-sixteenth to one-eighth of an inch thick), it was quickly removed, in the crown of the trephine, without injury to the dura-mater from the teeth of the instrument. Whatever, therefore, may be urged on the score of originality, Dr. Ayres was confident that no surgeon could employ this valuable contrivance without duly appreciating the sagacity of Dr. Galt.

"After the operation the flap was secured by a suture at each of its inferior angles, thus forming a valvular cover over the opening in the skull, at once excluding external agents, giving vent to exudations, and favouring rapid union. Cold water dressing alone was applied, and the case progressed satisfactorily until the third day, when a violent convulsion attacked the left side of the body, accompanied with smart fever, headache, vomiting, and delirium. Mild purgation, with steady

cold to the head, mitigated these symptoms; but the convulsion was repeated on the next day, and then extended to the whole muscular system. Croton oil with sub. myr. hyd., were now administered, until copious alvine results were obtained, and all untoward symptoms speedily disappeared. It was discovered, on inquiry, that he had been allowed full diet through mistake of the nurse, and this important point was sedulously watched and restricted during the subsequent treatment.

"At the end of the third week the wound was entirely closed, and no recurrence of the epileptic symptoms has taken place up to the present time, whilst the patient has entirely regained his former gentle disposition, and, with a good appetite, has wonderfully improved in flesh, strength, and general appearance.

"Dr. Ayres remarked, that whilst we had before us an undoubted case of recovery from a disease, too often beyond control, following an operation justly considered too serious and uncertain in its results to merit trial, except as a dernier ressort, it had stimulated reflection, and given rise to certain conclusions, which, to his mind, constituted the chief features of interest about the case. To recur to the condition of the button of bone removed, it had been found in all respects perfectly normal. The parts beneath were equally without indications of previous injury, or existing disease. How, then, are we to reconcile this total absence of the suspected, or indeed of *any* cause adequate to the production of such morbid phenomena, with the entire success of an operation which revealed nothing, and which, failing in its proposed object, was apparently useless, if not inapplicable?

"This result might be classed in the chapter of accidents, if we had not already too many cases, sufficiently parallel to justify us in seeking for a rational sequence between the operation and the cause of disease.

"Again, the removal of pressure from the brain, by favouring its power of expansion, or, perhaps, allowing some modification of its circulation, has been adduced to account for this dissipation of the epileptic symptoms; but it should not be forgotten that these advantages are seriously curtailed by the tense and unyielding dura-mater when left uninjured. Besides, it will be recollected that this patient suffered his worst epileptic seizures after the bone had been removed. No rational explanation of this paradox occurred to my mind until recently, and I am indebted for it to the experiments of Brown-Séquard. The importance placed by that distinguished physiologist upon what is known as 'the epileptic aura,' and the paramount necessity of patiently and repeatedly searching until the spot is found whence it starts, or seems to take its origin, seemed very applicable to this case; and, from its traumatic origin, very easy, when we came to direct the attention of the patient upon his feelings, for he distinctly recollected that he always felt pain and unpleasant sensations in the vicinity of the cicatrix just preceding the vertigo.

"Then, again, Brown-Séquard has obtained remarkable results from cauterizing this sensitive spot, whereby we may infer that the morbidly

sensitive nervous filaments are either destroyed and cut off from their cerebro-spinal connexions, or, at least, so modified in their function that the chain of morbid phenomena is temporarily and, occasionally, permanently broken.

"Is it not, therefore, probable that, to the free dissection of the flap, including the periosteum and cicatrix, we are indebted for the *REAL* cause of relief in *this* and similar cases? Is not this probability augmented, when we find paroxysms supervening, more severe than on any previous occasion, just at that time when the wound was swollen and about to suppurate; when, in fact, local irritation was at its maximum, and the irritation of undigested food in the alimentary canal was superadded?

"We think the sequence is complete, and the deduction logical, that in all such cases, before hazarding the serious operation of trephining, the superficial tissues which have been the subject of injury should be freely separated from the parts beneath and around, by subcutaneous division. This plan failing, a portion, sufficient to include all the injured nerves, should be freely dissected out, and its place supplied by sliding together the contiguous tissues, or by a patch transposed from neighbouring parts.

"In the discussion which followed, Dr. Lewis A. Sayre stated that nearly a year had elapsed since he performed a similar operation upon an adult, on account of epilepsy following a blow received many years previously on the occipital region, and immediately over the longitudinal sinus. The case had resisted all medical treatment, and he was a confirmed epileptic up to the time of operation. Although the disease had not since returned, yet he had been very much disappointed at the time, and had ever since been at a loss to account for the relief thus obtained, inasmuch as the portion of skull removed by the trephine was found absolutely free from exostosis or any other morbid change. He considered the explanations offered by Dr. Ayres as highly probable, and calculated to render our treatment of these cases equally successful, without danger to the patient.

"Dr. Andrew Otterson remarked that the relation of these cases brought to his recollection the case of a sailor who suffered from epilepsy following an injury, upon whom Dr. Buck operated several years ago. When the bone was removed no disease was found, yet the patient recovered, and he learned on inquiry a long time afterwards, that no return of the epileptic attacks had taken place."

Obituary.

WE have unhappily to record the loss of two well-known and highly honoured members of the profession—Professor QUEKETT, of the Royal College of Surgeons, and Dr. G. M. JONES, of Jersey.

A writer in the *Athenæum* states that Mr. Quekett began his career as a medical student at the London Hospital, and obtained by successful competition a studentship of anatomy, for three years, in the College of Surgeons; at the close of which, his superior attainments as an anatomist, especially in minute dissections and microscopical investigations, led to a permanent appointment in the Hunterian Museum. He was there principally occupied in extending and arranging the series of microscopical preparations; and the work on which his great reputation as a Histologist is chiefly based, is the “Illustrated Catalogue” of the specimens, showing the minute structure of tissues, in the College Museum, in Lincoln’s-inn-fields. Mr. Quekett was appointed Professor of Histology; and on the retirement of Professor Owen in 1856, became principal Conservator of that museum. But his health rapidly failed, and after successive severe and debilitating attacks he expired at Pangbourne, on Tuesday, the 20th of August. Professor Quekett’s published works on the microscope and microscopical anatomy have a high and deserved reputation; his great experience and vast extent of information made his opinion of peculiar value and in much request in obscure diseases and morbid alterations of structure; and the uniform readiness and urbanity with which he imparted his knowledge to all who visited, for that purpose, the museum of the Surgeons’ College, will make the memory of this most worthy and valuable officer gratefully cherished. Physiological science and the medical profession have sustained a great loss in this excellent and, whilst health and strength were spared him, indefatigable man. Professor Quekett was selected by the council of the Royal Society from the candidates for fellowship, and was elected in 1860.

The following account of Mr. Jones is from the *Jersey Independent* (Sept. 13th):—

George Matthew Jones was the second son of the late Charles Jones, M.D., of this place. He was born on the 14th of March, 1805, and in early youth commenced the study of his profession. Our local records tell us that at the age of twenty-two he was gazetted as Assistant-Surgeon to one of the Militia Regiments of this island. Commencing the pursuit of the profession he was destined to adorn, under the happiest auspices of his esteemed and respected, as well as distinguished father; and being possessed of an acute and discerning intellect, as well as an untiring zeal and energy, his success was assured. We find him at the age of twenty obtaining distinguished honours at the University of Edinburgh. He entered this medical school the year before, and during the whole period of his pupilage resided in the house of the celebrated Dr. James Hamilton, with whom he was an especial favourite. His aptitude for work soon gained him many friends, and on the completion of his second year’s study, we find him taking the first honours of the school for his anatomical dissections and dissertations. In 1826 he took his diploma of Surgeon, and returned to his native place, where he soon became known as a talented and

promising practitioner, succeeding his amiable and accomplished father, whose extensive connexion opened a brilliant prospect for the son.

In 1833 he was appointed Surgeon to the Ordnance, and some years later to the General Hospital, and afterwards to the Prison and House of Correction. It is needless to trace from year to year the progress of his professional career. Shortly after his appointment to the Hospital, he commenced a series of medical and surgical reports, in the preparation of which his intellect found fitting occupation, and which no doubt laid the foundation of that clear, lucid, and graphic style of writing which ever afterwards characterized his professional dissertations and contributions to medical literature.

In the year 1843 he contributed to the Medical Journals some interesting cases, the features and details of which at once stamped him as an acute observer, a bold and successful surgeon, as well as a sound practitioner. In the year 1853 he commenced those operations for the cure and recovery of diseased joints and preservation of the limb which, until their revival in 1850 by the distinguished Professor Ferguson, of King's College, had been deemed, in consequence of the comparative failures of Park and Moreau—"the opprobria of Surgery." Without discussing the merits of this order of treatment which its foremost and most sanguine partisans still admit to be *sub judice*, it is certain that the operations performed by the subject of this notice have gone far towards solving the problem; they certainly prove the feasibility of the method, and must be regarded as brilliant achievements in Surgery. Those achievements gained Mr. Jones an European reputation. His fame was reflected on the Jersey Hospital, which acquired a celebrity possessed by but few provincial institutions of the like character—a reputation, we must say, well-deserved, considering the liberal and generous treatment experienced within its walls by suffering humanity.

In 1855 the Royal College of Surgeons of England summoned Mr. Jones to London, and conferred upon him their diploma, intending, had he lived, to follow up this distinction by the still greater one of their Fellowship; the rules of that body rendering a certain interval imperative, else the highest honour would at once have been conferred. Other honours followed: to wit, the Honorary Fellowship of the Medical Society of London, that of the Medical Society of Paris, and of the Surgical Association of Berlin.

On the death of Dr. Macreight, Mr. Jones was appointed Medical Inspector-General of Militia, and by his extensive and daily increasing practice, continued to receive additional proofs of the high consideration and confidence reposed in his distinguished surgical skill. About this time he performed several difficult and dangerous surgical operations in which he was very fortunate; and as one of his sayings was "nothing venture nothing have," the boldness with which he encountered difficulty almost gave the stamp of originality to his achievements. It is only asserting a truism that his eminent professional abilities were acknowledged, not only by the profession, but by the public at large; so that subscriptions were soon raised, both in the Island, in England, France, and elsewhere, for a marble bust originally intended to be placed in the board-room of the General Hospital, but in consequence of the destruction by fire of that institution, it was provisionally deposited at his own house, to be placed at its intended location as soon as the Hospital is restored. This beautiful work of art comes from the studio of Patrick Macdowell, R.A. It is an excellent likeness, full of character and energy, and adds to the renown of the already celebrated sculptor.

A long and painful illness incapacitated Mr. Jones for a time for the active duties of his profession, but detracted nothing from his well-earned fame. He was always highly esteemed by his professional brethren for his sagacious as well as quick discernment of disease, and he was in the height of his happiness when surrounded by a numerous clinique, and exhibiting his cases, he received a stimulus to further exertion from their approval and applause.

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